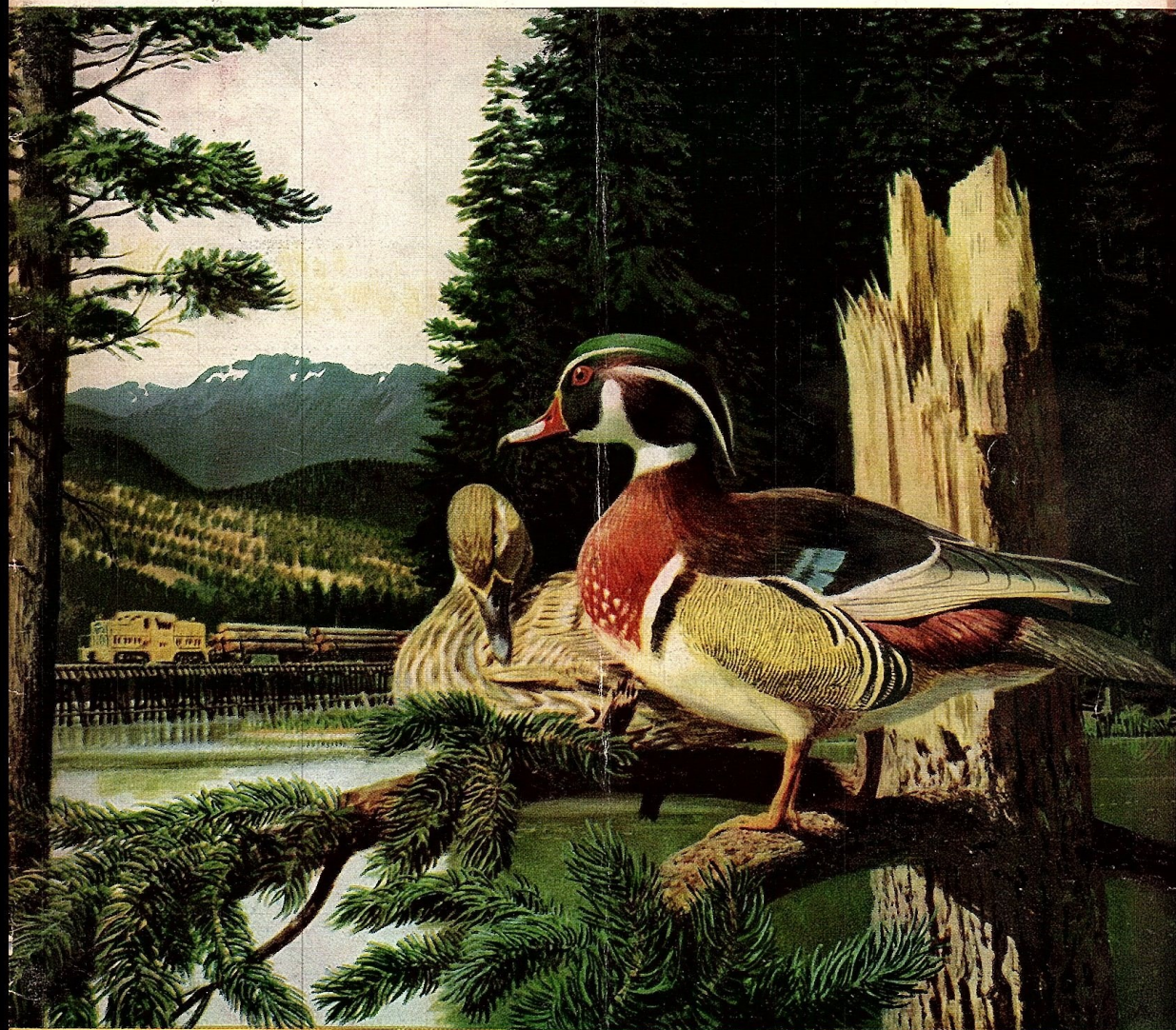
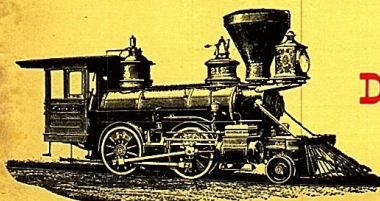


RAILROAD

MAGAZINE | OCTOBER 50c



Big Timber Country. From across the river drifts the faint rumble of a train on one of the Weyerhaeuser logging railroads.



Detailed List of Retired Steam Locomotives on
Display in U. S. and Canadian Parks and Museums

WILD HOGGERS AND NO BRAKES

BY "FROG" SMITH

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- CATCHES THE FISH THAT WON'T BITE ON WORMS, BUGS, PLUGS, SPOONS, CANNED BAIT, FLIES, CUT BAIT OR SPINNERS!

FROM PARIS, FRANCE, COMES NEWS OF AN AMAZING fish-catching lure. The world's first truly 'live action' lure that's guaranteed to catch more fish . . . catch bigger fish . . . and catch fish when everything else fails . . . or it costs you nothing.

A Beautifully made lure that saves you hours of work digging worms, catching minnows or other live bait! . . . saves you the endless expense of continually buying expensive plugs, spinners, flies and other fancy equipment designed to catch YOU instead of fish . . . lets you make your fishing trips

more fun, more exciting and lets you enjoy every minute you're fishing from dawn till dusk . . . with more and bigger catches.

A French Invention

The secret is a scientific 'live-action' tail that had never been patented before. Developed by a French sportsman who named it VIVIF, this wonder-working 'live-action' lure is the result of years of testing all kinds of lures on all kinds of fish . . . and watching the fish react to each lure under water. From these studies came VIVIF, the lure that works when everything else fails. VIVIF is now being used by over 350,000 fishermen in 25 countries who rave over VIVIF.

From all over come reports of record making catches . . . of fish biting where all other lures failed . . . of the sureness, the effectiveness of this miracle lure. Think what this means to you. Now at last you can catch every kind of fresh water game fish as well as salt water fish . . . and never spend a penny for fancy plugs, spinners or flies again. You can do away with digging for worms, catching bugs, frogs or minnows. You can cast, troll, shore fish . . . all with equal success. You can go out after . . . and come back with . . . bass, pike, pickerel, perch, bream, trout, walleyes, salmon, red tuna, striped bass, bluefish, weakfish, and do it time after time without any previous experience.



PHOTO PROOF!

Fish just can't resist the amazing VIVIF with its patented "Live-Action" tail! VIVIF caught this 40 lb. salmon for Mr. G. F. Coleman and 1st prize in a fishing contest.

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AMAZING VIVIF is Flexible, Soft And Super-Realistic. VIVIF is soft to the touch like a live minnow . . . wiggles like a live minnow . . . swims realistically in the water. VIVIF CONTINUES TO ACT LIKE A LIVE MINNOW EVEN ON A SLACKENED LINE. Perfectly balanced, VIVIF casts beautifully with either bait casting or spinning equipment. Doesn't spin . . . can't twist your line. VIVIF WAS DESIGNED TO CATCH FISH . . . NOT FISHERMEN!

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THE MAGAZINE OF ADVENTUROUS RAILROADING—FOUNDED 1906

VOL. 70, NO. 6

OCTOBER, 1959

50 CENTS

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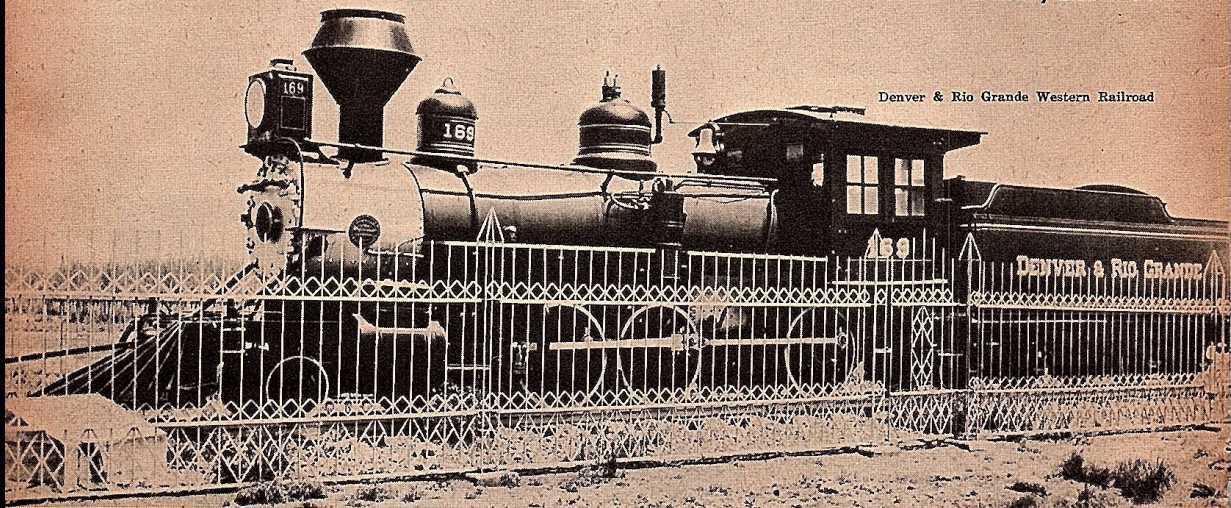
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D&RG narrow-gauge No. 169 in Alamosa, Colo., is protected by a fence.



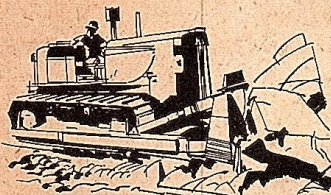
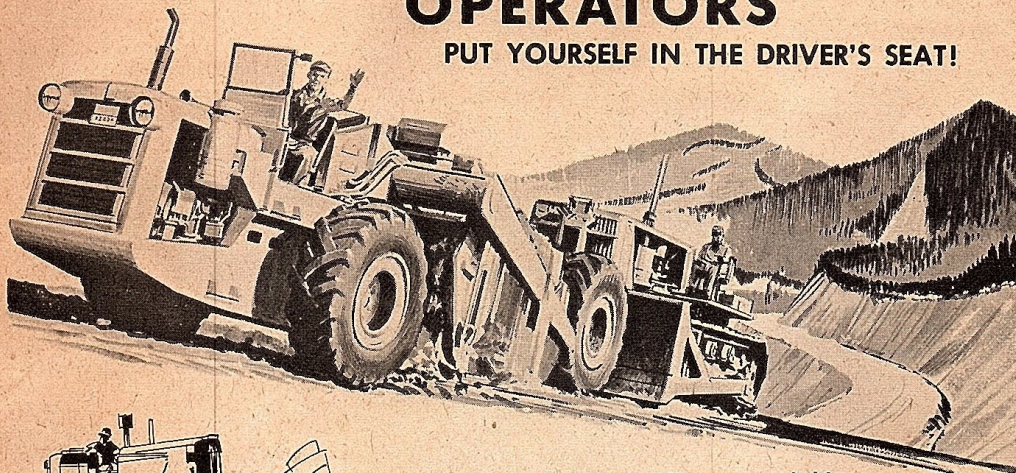
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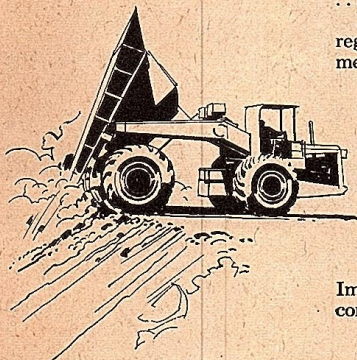
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OCTOBER, 1959

5



Last of Weyerhaeuser's steam engines, No. 100, still used occasionally, is wheeling a log train from Camp Sutherlin to the Southern Pacific tracks 20 miles distant.

ALTHOUGH the Weyerhaeuser railroad is dieselized, it retains a steam locomotive, "Old 100," for stand-by service. On occasions when the diesel shown in our cover scene is off the job for repairs, this ghost from the glory days of logging is fired up to wheel loads of "Bunyan's toothpicks" from Camp Sutherland near Springfield, Ore., to the Southern Pacific 20 miles away.

Old 100 wasn't the first of the nearly three-score locos used by Weyerhaeuser Timber Co. during the past half-century but is definitely the last. Crew men say she requires less work to keep in good operating condition than her diesel counterpart.

The tall-stacked 100-ton steamer is

a 2-6-2 oilburner built in 1921 by Cook Locomotive & Machine Works of New Jersey. She helped to build Hetch-Hetchy Dam in the Sierras for the San Francisco Water Department, from which Weyerhaeuser bought her in 1937.

Then she worked around Vail Tree Farm until 1948. Now she stands on a sidetrack, idle except when called upon to perform her twin chores of hauling logs and reminding all within earshot of her whistle that the days of steam in the big woods are not quite gone.

Our cover picture was painted by Stan Galli for a Weyerhaeuser ad which won *The Saturday Review's* top award in an annual competition for advertising

MAIL CAR

*Railroaders and Fans Sit in
With the Editorial Crew*

in the public interest. Weyerhaeuser ads belong to that class because they stress forest conservation. While the company is cutting down trees for industrial use it is also reforesting vast areas of land so it will not deplete the country's natural resources.

A detailed history of *Lumber Railroads of the Weyerhaeuser Timber Co.*, with many pix and a complete locomotive roster, may be found in *Pacific Railway Journal*, Vol. 2, No. 1. The *Journal* is edited by Donald Duke, 2304 Melville Drive, San Marino, Calif., and published four times a year by Railway & Locomotive Historical Society, Southern California Chapter. Its all-Weyerhaeuser issue has 16 pages, excellent paper, same page size as *Railroad Magazine*.

150 MILES PER HOUR top speed is planned for the new super-railway being built in Japan as a 300-mile short cut between Tokyo and Osaka. This electric line will be completed in five years, officials say, at a total cost of nearly half a billion dollars and will permit running the world's fastest trains—trains so swift they'll need radar-operated brakes!

Ground was broken last April 20 for the line's longest tunnel, five miles, under foothills of beautiful, snow-peaked Fujiyama which is shown on many Japanese prints. The National Railway predicts it will run three-hour Tokyo-Osaka expresses at an average 100 mph. Fastest trains on the present 343-mile route between those two big cities, jammed with more than 300 trains a day, make the run in 6 hours 50 minutes at an average of 53 mph, top speed 74.4 miles per hour.

Besides being 43 miles shorter than this route, the new line will be Japan's first standard-gage (4 feet 8½ inches). One big problem is designing automatic brakes, probably with radar, to stop trains going too fast for locomotive crews to read the signals. The air brakes now in use require 2½ miles to stop.

"BEGINNING in 1906," writes A. W. Meyer, 4335 N.E. Laurelhurst Pl., Portland, Ore., "I railroaded

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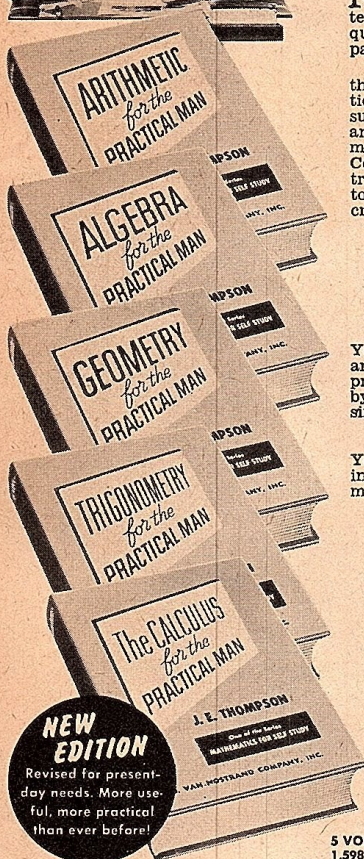
ALGEBRA: This volume makes algebra a live, interesting subject. The author starts with simple problems that can be solved by arithmetic and then shows you how to apply algebraic methods.

Among other subjects, it teaches you all about logarithms—the method of computation that engineers use to save time. It also shows you how to solve problems which are involved in business and industrial work relating to machines, engines, ships, autos, planes, etc.

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nine years, mostly in telegraph service but including a year and a half as head brakeman on Great Northern passenger trains. The latter was because in 1909 the GN adopted a rule that one brakeman on each passenger train must be a telegrapher. I also worked for the Northern Pacific and the Spokane, Portland & Seattle.

"At one time I seriously considered going into engine service, but in those days you could hardly ever pick up a daily paper without reading news of a GN train wreck. This upset my mother so much that I gave up the idea of becoming an engineman.

"In 1910, the year of the great slide at Wellington, Wash. (see Aug. '59 *Railroad*, page 71) I counted 31 engine crew men who lost their lives in accidents on the Cascade Division alone." •

DAILY, for almost ten years, a dog of obscure ancestry known as Spot has been meeting Great Northern trains that roll through the quiet Chumstick Valley in Washington, where he lives on a remote 40-acre farm with Mr. and Mrs. Edgar A. Connon.

"Spot doesn't just wave at the trains," Bob Brown wrote in the *Seattle Post-Intelligencer*. "He has business with them, and the GN people like to please the public—even if the public has four legs and a bushy tail. So at least one crewman on each train during daylight hours sees to it that a rolled-up newspaper is tossed to Spot where he waits on the bank above the track. Spot takes the paper from the ground—or in winter from the deep snow—and hustles up the bank to deliver it to Mrs. Connon."

He isn't as impetuous as he was in the days of steam power. Then, he'd hit the bank at the first, faint, mournful blast of a banshee whistle far down the valley. Now he lies on the back porch, only an ear alert for the disdainful *bonk* of a diesel air-horn. When the train is a quarter-mile away, Spot saunters out to the bank, yawns, and seats himself to await the big orange-striped diesel locomotive and cars. No doubt about it, that dog prefers steam. Walt Thayer, a former GN section man, sent us this story. •

CANADIAN PACIFIC coaling dock at Teeswater, Ont., pictured on our August contents page, was dismantled in 1957. This type of plant, with air-operated hoist, derrick and pulley arrangement, and one-ton buckets, was used at many CPR branch-line termi-

nals where only a small amount of coal was needed for locomotives. One is still in service at Port Burwell, Ont.

A reader asks, "Are any Hull type interlocking machines left on CPR?" No. The last one, installed in 1913 at Union Station, Ottawa, at Hull Electric Railway crossing, was removed in 1946 when the HE was dissolved. •

WANT to buy steam relics? Grand Trunk Western offers non-swing type locomotive bells, \$40 each; brass number plates, \$12.50 each, and builders' plates, \$5.50 apiece, f.o.b. Battle Creek, Mich., cash on or before delivery. All orders at these prices must be in writing, addressed to GTW headquarters.

This report comes from Charles R. Foss, Box 5087, Rte. 1, Cherry Valley Rd., Middleville, Mich., who adds: "GTW territory west of Durand, Mich., is 100 percent dieselized. Last steamer in that area was No. 6040 on train 56, Muskegon to Detroit, Dec. 2, 1958.

"But the road is still using steamers between Durand and Detroit. All three commuter trains are 100 percent steam and probably will remain so at least until 1961. Train 122 from Durand also is all-steam; so are 65 percent of all Durand-Detroit freights, while 75 percent of the Durand yard jobs are steam.

"Durand is the center of all GTW steam power because the roundhouse there is completely round. Its turntable is big enough only for a single-unit diesel. Therefore, they cannot move any two-unit road diesel into the roundhouse unless they run both units from the entering track onto the turntable and across it to the opposite stall in line with the roundhouse. This could be done only with two of the roundhouse stalls.

"You won't see a diesel in that roundhouse. I guess the GTW figures that if they can't run road diesels into the roundhouse for repairs, what's the use of converting it for yard diesels and single-unit diesels seldom used in road service?

"The roundhouse is usually full of steamers, from 0-8-0's and little 2-8-0's to big 4-8-4's which barely fit the turntable. Durand is the GTW's only place where a steam locomotive can still be fully overhauled. Anyone desiring to go through this roundhouse should first ask the foreman. The GTW, like other roads, has been having trouble with vandals swiping builders' and number plates inside the house. They do not

take kindly to strangers who walk in unannounced." •

A TRAINMASTER was in the yard office checking over several things, when suddenly an engineer's voice blared from the radio loudspeaker. "We derailed a car just west of Midville..."

At this point, the trainmaster interrupted. Having an opposing train ready to depart, he inquired sharply, "Does it clear the eastbound?"

"Yeah," was the reply, "but the 31 cars piled up behind 'er don't." •

DDOUBLE-PAGE photo of Central Vermont No. 53 in our June issue opened the floodgates of memory for Elwin K. Heath, Barre, Vt. "How well I recall that engine!" he writes. "She ran on the old Williamstown branch, replacing No. 52 after the latter had been wrecked one cold January morning in 1912.

"I spent my boyhood not far from Williamstown. Several times I was thrilled to be allowed to ride in her cab. The branch had been planned to be the Montpelier & White River Railroad, operating between those two points, but somehow, by the time the line reached only as far as Williamstown, plans were changed and the present-day route was built instead between Montpelier Jct. and White River."

Mr. Heath sends us this present-day CV roster from the road's motive power department. It includes only the engines lettered *Central Vermont*, not those that pull through trains under lease to the old CV. All are 0-4-4-0's. The first three lines are 1750-hp. road-switchers built by GM, Electro-Motive Division. The rest are also switchers, 1000 hp. Nos. 8093-8095 were renumbered from 7917-7919, No. 8161 from 8015.

Nos.	Class	Built
4547-4557	GR-17-l	March, 1957
4923-4927	GR-17-k	March, 1957
4928-4929	GR-17-s	Dec., 1957
8027	MS-10-d	May, 1953
8080-8081	MS-10-j	Sept., 1955
8093-8095	MS-10-a	Dec., 1941
8162	MS-10-d	Oct., 1951

WHAT is a steam locomotive? This question was asked of William J. Parry when he qualified for his engineer's license. The official answer was: "A boiler and one or more engines, mounted on wheels, with the power within itself to move in either direction."

"Of course, a locomotive is much more than that," comments Bill, who is now a retired Canadian National hogger living at R.R. 1, Belle River, Ont., Canada. "It's beauty and mystery.

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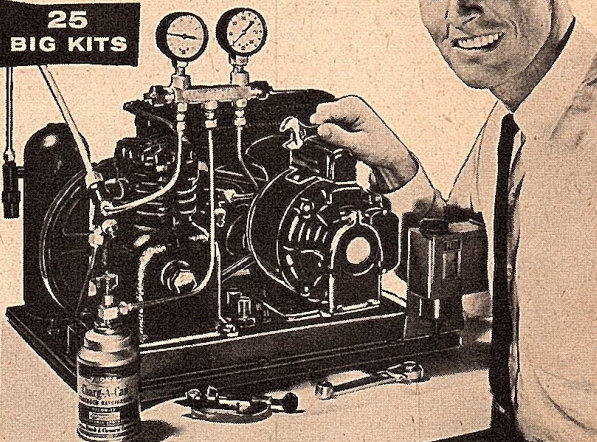


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TYPICAL LETTERS FROM SUCCESSFUL STUDENTS

“I have been very busy. Had an offer to work for an appliance dealer but it looks like I'll be in business for myself before long.”—*Frank Fuller, Wells, N. Y.*... “Am now working in the field. Earn \$40 more per month than before.”—*Frank Krotzer, Houston, Texas*... “I not only got a job, but today am foreman, earning \$60 a week more than before I enrolled.”—*E. E. Hughes, Chicago*... “Have my own business. Only problem is: Too much business!”—*Conrad King, Cynthia, Ky.* You can do as well as these men!

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There are close steamers and free steamers, free-wheelers and engines that simply won't run for anybody. Some are temperamental; others behave beautifully. The steam engine terrified children up 'to five, fascinated them at twelve, and became a photographic subject for teen-agers and adults. Its mournful whistle wailing through the night filled many a man with wanderlust, made him a boomer or a hobo." •

A MAN interested in keeping *Railroad Magazine* on the main line is R. L. Johnson, 107 Tribou St., Brockton, Mass. "I not only buy every issue of *Railroad*," he writes, "but persuaded our local public library to subscribe for it."

We will be proud to publish similar news from other fans. Public libraries and school libraries all over the English-speaking world should have this magazine on their shelves. •

NOSTALGIA. The following comes from an old retired brass pounder who is also a poet: Charles D. Dulin, 1720 New Jersey Ave., Kansas City, Kansas:

Railroads to some people are engines, cars, and tracks. To an old telegraph operator like me they are the odor of creosote and kerosene, the clank of lonely semaphores. They are the crash of couplers and "All aboard!" The flapping of loose shingles and the twitter of sparrows at an OS set, the glow of daybreak on a graveyard trick, the pot-bellied stove, pungent bays, and four short blasts from an eagle-eye. They are sun-up after all night on a day coach, in strange territory.

They are the old brass lamp, the red, yellow, and green lanterns, and bamboo loops. A fat hogger banging in to growl at the operator. Thin wisps of smoke drifting high and the distant rumble of a train. The desultory themes of sounders on a night job, the hum of telegraph poles, and the roar of trestles. The bark of yard goats, the hissing of engines in the roundhouse. The clatter of passenger vestibules, the mumble of couplers, glistening wires, outfit cars on a siding, stock pens, and droning dispatchers.

They are sheen on the rails, rhythm of spotted wheels, the scream of locomotives. The willow-whistle sound of back-ups, scraping of horns on the cars, and the *pfit* of air-hoses. Mrs. Murphy's boarding house, oiled waste, the clank of journal box covers. Switchmen, brakemen, and engine crews exchanging

banter in the beanery. A blond waitress, the agent's cap hanging by the ticket window, and a drowsy op leaving the third trick. Far-away places, buzzing beehives, slickered mudhops, and runners calling attention to their signals.

They are sunrise and splendor, whispering relays, selector sounds, and moving splotches of light on the wall. A section foreman's daughter and the crunch of cinders on the platform. A glorious dream that filters back through shimmering mist to Charles Dulin.

And here's a poem Charlie wrote. He calls it "Return of a Morse Man."

This is the place where echoes bounce around

And phantoms come and go as in a dream;

This is, in fact, my olden native ground
Where with the Morse I helped direct the steam.

These are the things I've thought about for years—

This old train-order desk and school-marm chair;

This is the place where Dame Nostalgia cheers

From that old bill press standing over there.

This is the place where rudiments were taught

And where I struggled with the strange device,

Where romance winged about "What hath God wrought"

And whispering lamps revealed the flash of mice.

This is the place where boomers dropped from freights,

Sat in until their feet began to burn,

And dreamed of likely trails across the states,

Then hit the pike to points of no return.

This is the place that weeps with mellowness

And cries aloud against the flight of time;

This is the place where old-time rails caress

A bygone era sung in tale and rhyme.

This is the place where odors, sounds and sights

Crowd in upon a most-receptive mood
When thoughts go drifting back on restless nights

To little depots bathed in solitude. •

ONE MAN'S OPINION. "Best of all railroad records is *Sounds of Steam Railroading* (O. Winston Link, 58 E. 34th St., New York City) and probably the second best is Link's latest hit, *The Fading Giant*," writes Dr. George T. F. Rahilly, bone and joint surgeon, 100 S.E. 11th Ave., Fort Lauderdale, Fla. "Those two disks feature mostly N&W Mallets. Their beauty is due to superb sound engineering.

"Five or six of the disks put out by Wm. Steventon's Railroad Record Club (Hawkins, Wis.) are excellent, espe-

cially those with sounds of B&O Mallets, the Canadian Pacific, and electric roads. Honorable mention goes to *Big Boy* and side 2 of *Farewell to Steam* (both Stan Kistler, Box 4068, Pasadena, Calif.).

"Years ago, Cook made a masterpiece with *Sounds of the Great Railroad* on one side, *Rail Dynamics* on the other. This small disk, recorded along the New York Central, has some of the most enchanting sounds I've ever heard.

"Among the other good ones are *Rio Grande Narrow Gauge* and *Rods, Wheels and Whistles* (both North Jersey Recording Associates, Box 2, Maplewood, N.J.). Also *Steam in Twilight* (Puget Sound Ry. Hist. Asso., 3008 Harvard Ave. N., Seattle, Wash.) and *Steam in Colorado* and *Great Moments of Steam Railroading* (both Mobile Fidelity Recording Co., 915 Hollywood Way, Burbank, Calif.).

"I dislike Mobile Fidelity's *Memories in Steam*, which seems to be faked and poorly engineered; but at the very bottom of my list is *Railroad Sounds* (Audio Fidelity), an appalling thing, mostly the noises of diesels and an Illinois Central steam switcher."

Dr. Rahilly does not mention *Songs of the Railroad* (Cabot Music Corp., 116 Central Park South, New York City, \$4.98), which we think is the best recording ever made of railroad ballads, both familiar ones and some that are not well known. Nor does he mention *Men of Steam* (Stan Repp, Box 654, Manhattan Beach, Calif.), reviewed in our August issue.

Using his influence with the Chicago North Shore & Milwaukee, Dr. Rahilly has just succeeded in persuading that road to let Steventon's record club make sound tracks of the entire North Shore Line.

"You see," he explains, "I have good relations with their legal department because of a recent collision in which I was involved. The company could not get over the fact that although I sustained injuries, I did not sue the North Shore but sued the motorist who had caused the wreck—a type of legal action apparently unprecedented in railroad circles! Through my testimony in court I helped the railroad to recover from the motorist a good part of the damage claims that had been leveled against the railroad itself by some near-sighted train passengers."

So if you ever listen to a North Shore recording, you can thank Dr. Rahilly for having made it possible. •

How Close to Divorce Have You Come?

YOU may never know the answer to that question. You may never suspect that your wife was even thinking of such a serious thing. But stop and think for a moment, "What are the three things that she really expects from you, her husband?" The answer must be love, companionship and financial security.

Ask yourself this question honestly now: Are you giving your wife the companionship she craves? Do you feel your best — are you fully alert, and able to endure the daily stress and strain of your job?

If you haven't the pep and vitality you'd like to have, if you feel all "worn out" after a day's work, if you lack enough energy for both work and play then watch out! You may be suffering from an easily corrected nutritional deficiency in your diet, and something should be done about it!

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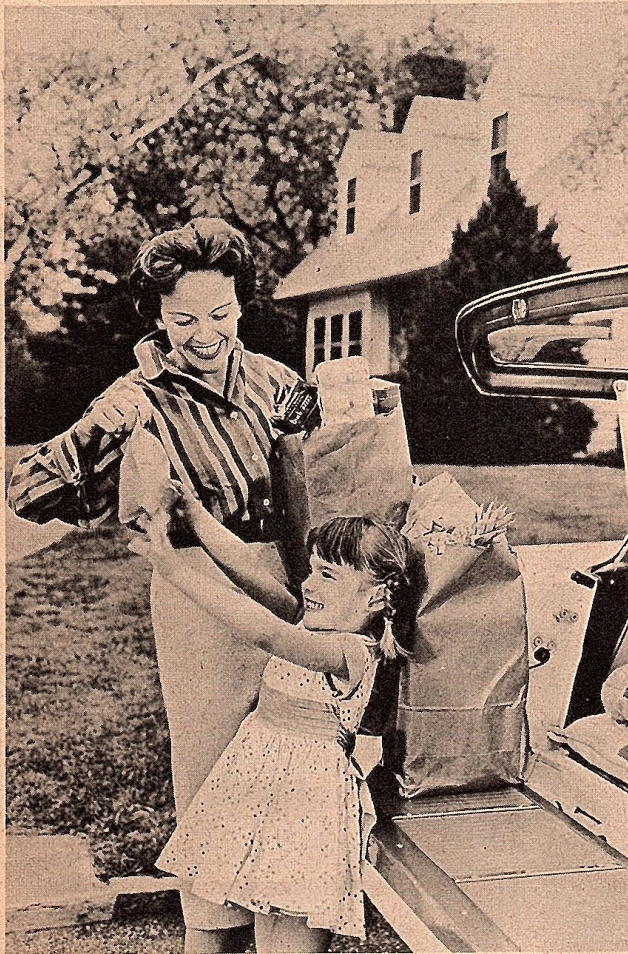
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Woman who "never uses" the railroads



The car she drives . . .
The food she buys . . .
Her family's clothes . . .
The new house she loves . . .

They've *all* come her way on the railroads — either as raw materials, as component parts, or as finished products.

Woman who "never uses" the railroads? There's never a day when she doesn't!

Railroads carry more of the things you use than any other form of transportation. And they save you money, too, because railroads are a *low-cost* way of shipping freight.

That's why financially sound, progressive and strong railroads are important to you. They are essential both to an expanding economy and to the national defense. It's in your interest that railroads be given the *equality of treatment and opportunity* on which their health depends—now and in the future.

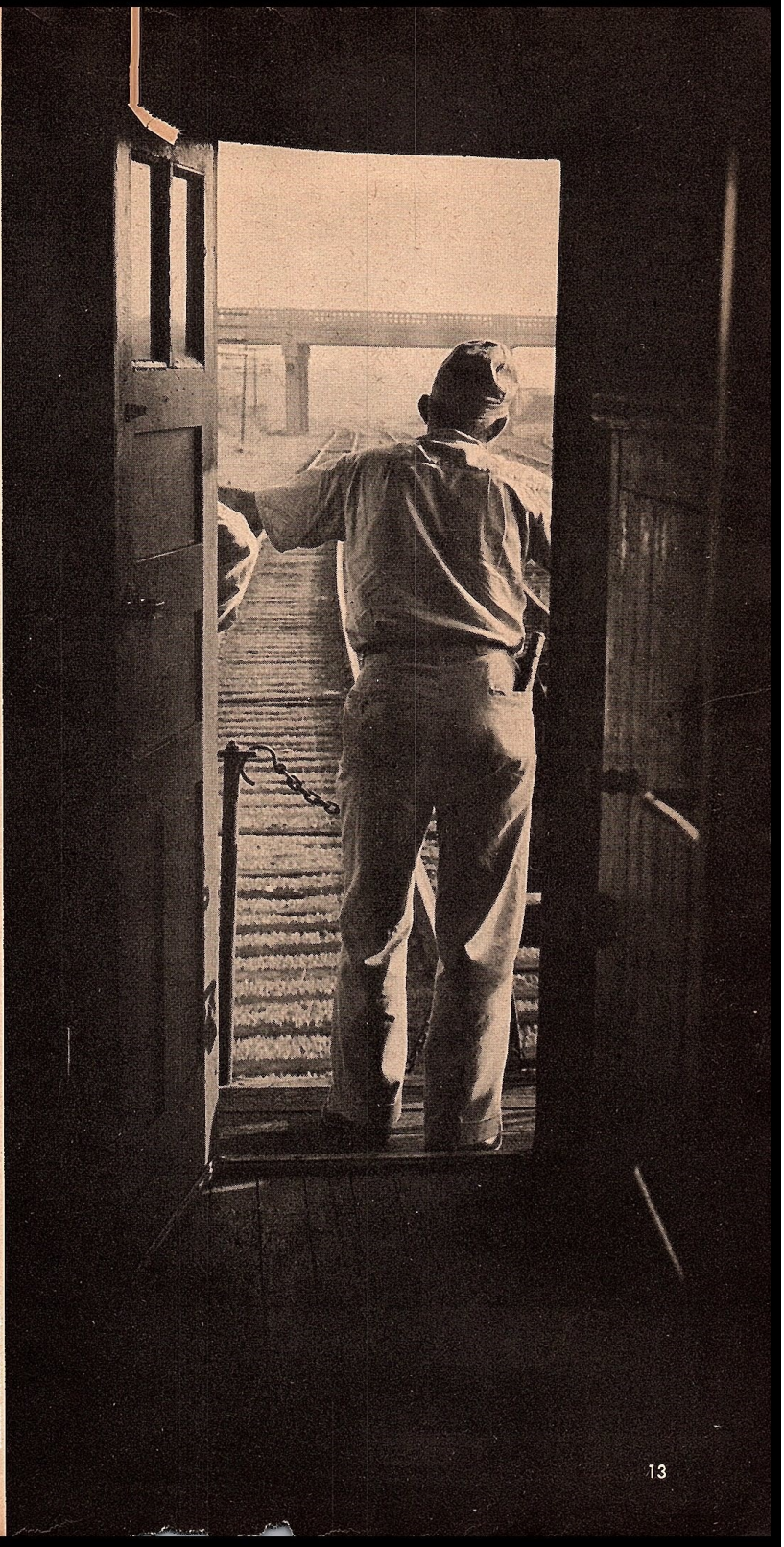
ASSOCIATION OF
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WASHINGTON 6, D. C.

Photos of the Month

Flagman J. O. Edwards keeps sharp lookout from rear platform as Illinois Central redball freight LM-3 backs into New Yard at Fulton, Ky., on run from Louisville to Memphis.

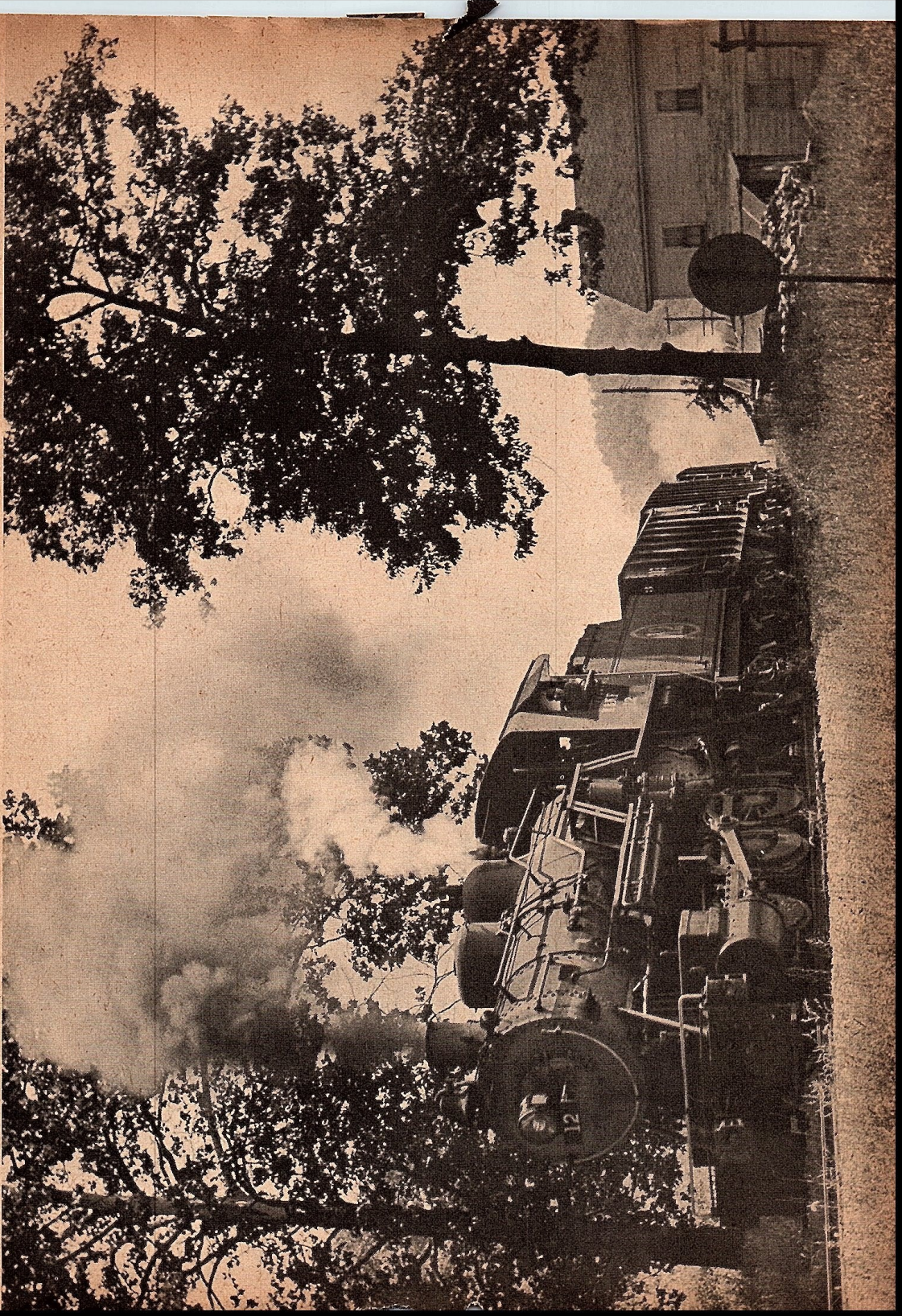
Illinois Central Magazine





Remember the steam power of the
old East Broad Top? No. 14 is
trundling freight over Aughewick
Creek in Pennsylvania in 1952.
Richard J. Cook, 3402 West
135th St., Cleveland, Ohio

Proof that the Morehead & North Fork is still using steam comes from David Knox, Star Rte., Parkesburg, Pa. This recent photo shows No. 12 near Morehead, Kentucky.





Not very long ago, when the Western Maryland operated coalburners and banjo-type signals, Frank Clodfelter made this nostalgic shot of a sturdy Consolidation, No. 811, Class H9, Baldwin-built in 1921, wheeling a coal drag through Brantsville, Pa.

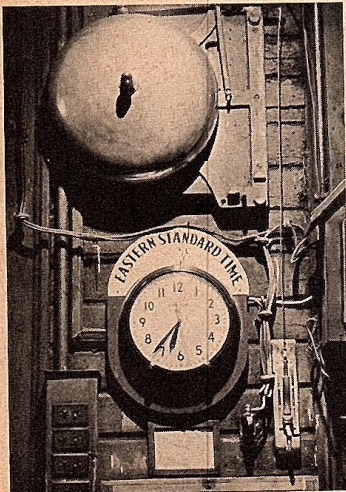


On March 24th for the last time New York Central boats crossed the Hudson River between Manhattan and the Weehawken terminal you see here. Today the ancient slip is bleak and deserted. Service which began over 130 years ago is no more.

Good-bye to New York Central Ferries!

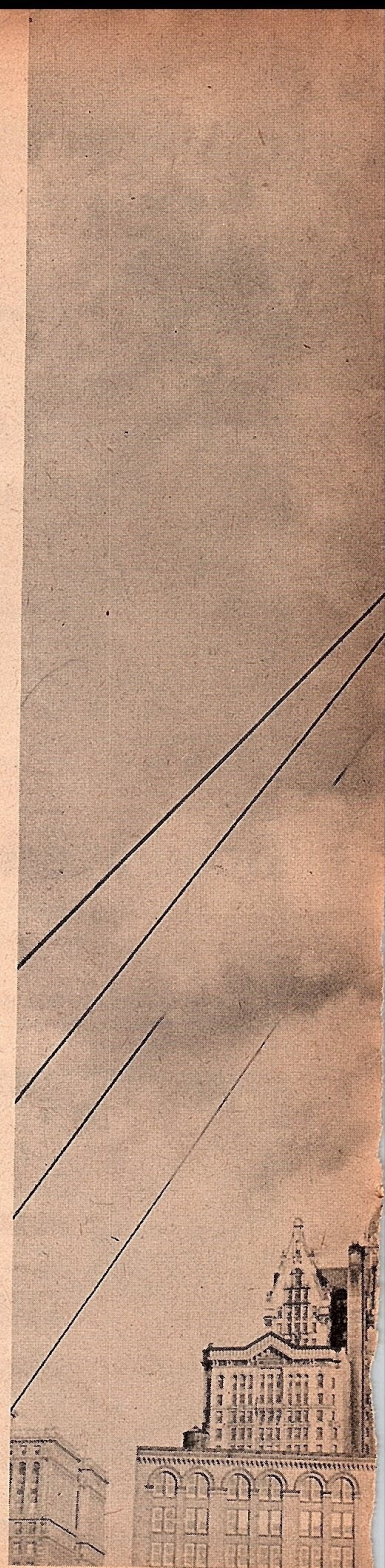
Photographs by David Plowden, 1239 Madison Ave., New York City

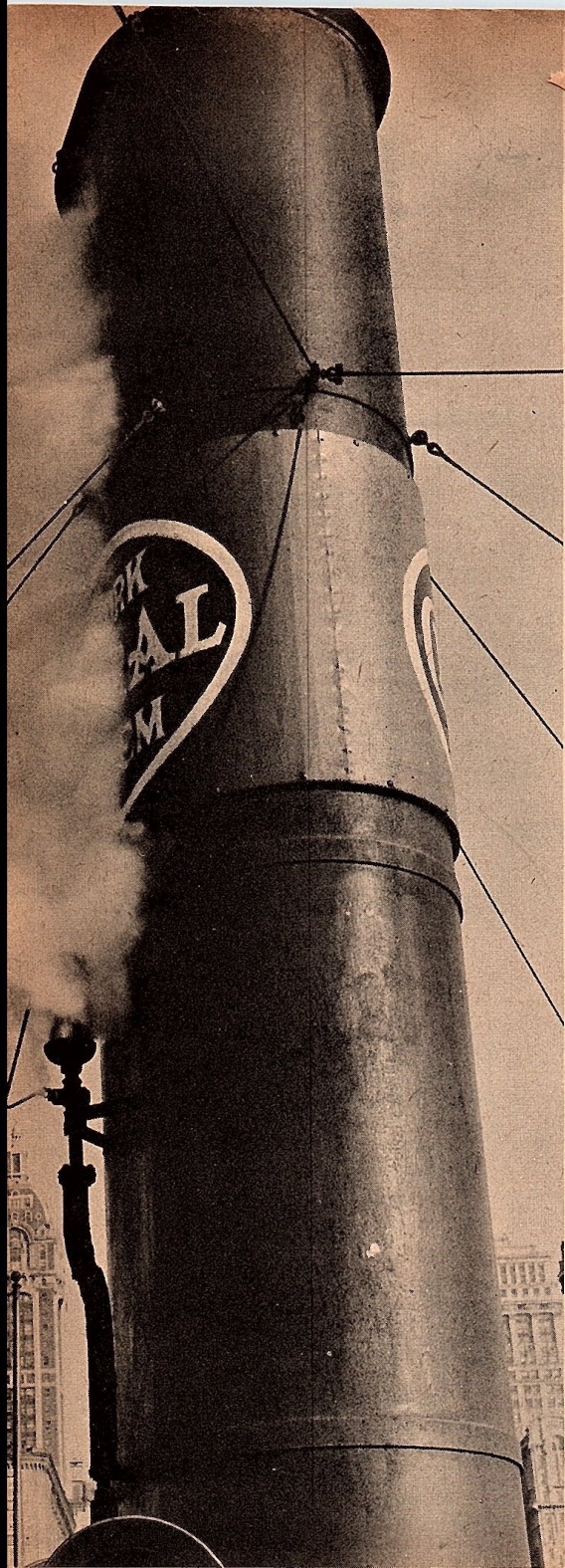
This bell announced the departure of each boat from Weehawken ferry house. (Right) Last to cross was the *Utica*.





In the wheelhouse, Captain L. G. Grabner of the New York Central's *Weehawken* watches loading of vehicles just before pulling out of 42nd Street ferry terminal. (Right) The *Albany* gives a hoarse steam-whistle blast as she leaves Cortland Street slip.





A lone passenger on the *Weehawken* fits into a pattern that commuters have known for many long years but may never see again, at least not on New York Central Railroad ferries.

Steam Power Today on the
BEVIER & SOUTHERN

by **HANK BILLINGS**

PHOTOS BY BETTY LOVE



Four-stall roundhouse on the B&S at Bevier, Missouri, one of the very few steam-operating common carriers left in America.

Baldwin-built 112, her tender and hoppers heaped with soft coal from Bevier Mine, tackles a gravity grade near mine tippie.



WHEN J. E. Agee, president of the coal-hauling, coal-burning Bevier & Southern Railroad in north-central Missouri, signed the first page of a new guest book in the company's converted coach office he noted, beside his signature, "Office clerks asleep."

William Eyman saw it and grumbled. Bill is assistant secretary, freight agent, train dispatcher, and a minority stockholder on the B&S.

"Don't know why he made it plural," said Bill. "I wasn't even here that day."

Although the B&S men are usually wide awake, visitors who come unexpectedly upon the standard-gage short line are tempted to pinch themselves to find out if they are dreaming. You drive west through Missouri on Highway 36 from Macon and turn south on Route C. At Bevier (population 838) you cross the CB&Q main line and turn west on a dirt road. Thus you reach the Bevier & Southern.

If you make that last turn at the right moment you'll see one of the road's four steam engines etched against the bright Missouri sky, taking a drink from an old wooden water tower. Yes, sir, four steamers in a world gone diesel!

One of them is ready for scrapping, but the other three are definitely active—the only active steamers left in the state. President Agee, who owns 995 of the corporation's 1,000 shares, is determined to keep it that way.

"We have no intention of using diesels," he says, "as long as we can run the steamers. We explored the possibility of dieselizing but rejected it because of our investment in steam power and because of our ready access to coal."

White smoke drifting lazily from the tall stack of No. 10 convinces you that present-day steam operation is no mirage. Even if you missed the water stop and arrived as the 10-spot was away wheeling empties over ten miles of almost continuous grades and curves to the Bevier Mine or bringing back a string of hopper cars loaded with soft coal, the illusion of yesteryear remains.

OCTOBER, 1959

There's the weather-beaten water tower, for one thing, a familiar sight all over North America not so long ago. Also a four-stall roundhouse, aged by a half-century of cinders and smoke. And, of course, the four locomotives.

The illusion is helped by the converted coach that since 1937 has been used as the little railroad's office; a mute reminder of the days when this same coach, built by AC&F in 1915, hauled B&S passengers.

Inside the roundhouse you'll find a machine-shop powered by coal. A boiler operates a stationary engine, with its cobweb of belts and pulleys, running two lathes, a drill press, a planer, a bolt machine, emery wheels, and a grinder. An ancient anvil in the dusty shadows reminds you of a blacksmith shop.

Eura Kilgore, master mechanic and one of the road's six stockholders, tells you that the machine shop and its few employees are kept busy supplying scarce parts for the locomotives.

"We can get some parts from the Burlington and we can still get castings," he adds.

The roundhouse boiler, which also heats the nearby office, is kept fired up all the time. When it's down for repairs, one of the locomotives pinches as a replacement, although the quarter-inch steam line used in that setup doesn't provide enough power to operate many items in the shop equipment at once.

Strip-minded coal is loaded direct-

ly into tenders at the tipple or is transported to the roundhouse for the stationary engine or stand-by locomotive in one of two gondolas leased from the Burlington.

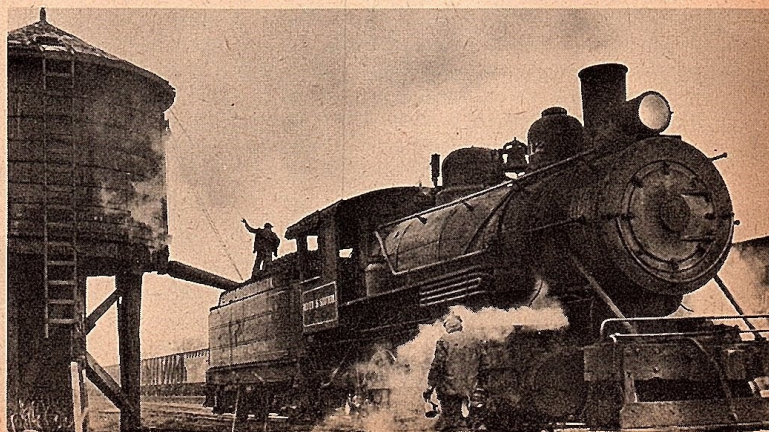
Two flatcars used for section work are the only cars owned by B&S. The railroad has no caboose, but shop workers are building one, on a small scale. It's to match a scaled-down replica of a B&S locomotive they built in spare time for a centennial celebration at Macon. Both models will be exhibited at a centennial celebration in Brookfield, a CB&Q division point.

THE FULL-SIZED steam engines, which have attracted railfans from all over the country, include three hand-fired 2-6-0's. Largest one is No. 109, built by Brooks in 1900 and acquired from the Illinois Central in 1946. Weighing 177,300 pounds, her tractive effort is 42,559 pounds. Her boiler is rated at 215 pounds pressure and her cylinders measure 20½ by 28 inches.

The only B&S locomotive acquired new and still in service is No. 112, built by Baldwin in 1920. She has 20x28-inch cylinders, 200 pounds boiler pressure, 51-inch drivers, and a tractive effort of 29,500 pounds. She weighs 137,000 pounds.

No. 111, acquired new from Baldwin in 1907, is about to be scrapped. No. 110, also Baldwin-built in 1907, was obtained from the Minneapolis & St. Louis in 1943. Specifications: weight, 162,000 pounds; tractive ef-

While Bernard Weber is giving 112 a drink from the wooden water tower, his hogger, Clint Cross, walks through a cloud of leaking steam to lubricate the old girl.



fort, 32,930 pounds; 51-inch drivers, 190 pounds boiler pressure, and 20x 26-inch cylinders.

The railroad's latest and largest acquisition is a Mikado, No. 4943, Class O1A leased from the CB&Q. She replaces No. 4955, also taken out of service because of flues and tire tread wear. No. 4943 weighs 310,780 pounds and exerts a tractive effort of 58,090. Although delivered in March, she wasn't put into service for a month because daytime thawing of nighttime frost might have allowed the roadbed and track to heave under the Mike's weight.

"It's been pretty muddy," says Master Mechanic Kilgore, "and we'd have a time if we put this big engine on the ground."

Kilgore, a 45-year veteran with the line, recalls that the road has had several derailments, which were handled by local section crews except for a few times when they borrowed a big hook from the Burlington. He is proud of the fact that "We've never had an engine overturn or a boiler explode."

When the B&S acquired its first Mikado, some changes had to be made in the roundhouse. One stall was extended outward, the smoke jacket was moved forward, and a chunk was removed from one side of the jacket to clear the locomotive stack.

A week after 4943 went into service she developed stoker trouble. Mechanics from Burlington's Hannibal shops were called in to help.

"Those boys miss not have steam to work on," said Kilgore, grinning.

As soon as the Mikado goes into regular service she will cut the railroad's four or five daily round trips to one or two. The B&S runs while the mine operates, year round, from two to five days a week, hauling an average of 50 cars of coal a day.

The small engines can handle only about a dozen loaded cars apiece. They can herd 20 empties, but have to double to perch empties on the hill, from where they are gravity-fed to the tipple.

The Mikado can wheel twice that many empties. Or she can take 30 loaded cars to town without dou-

bling at one of the line's two sidings to pull the most challenging grade, a mile-long, S-turn affair just outside Bevier.

Meanwhile, No. 4943 is an eye-catcher for the parade of visitors who have filled 14 pages of the guest book that President Agee opened in 1958 with the sleeping clerks' observation.

B&S employees welcome visitors. Obliging they shunt trains whenever photographers want them when it can be done without interrupting the operating routine, but officials turn politely deaf ears to request from railfans to ride the trains.

Mr. Agee points out to fan clubs suggesting excursions that B&S lacks both insurance protection and coaches. He recalls the day when a devout B&S engineer was marrying a minister as a passenger and became so engrossed in a religious discussion with him that the engine bumped an automobile at one of the line's few grade crossings.

As recently as two years ago, the short line was six miles longer than its present ten miles. Service over a spur from the present terminus to Darksville was suspended in 1957 when mining operations there ceased.

"We left the track down," says Bill Eyman, "but it's grown up in brush. We'd have to send a logging crew in there before we could run a train over it."

Trucks cross the unused tracks as they haul part of the Bevier Mine's production several miles to Excello for pickup by the Wabash.

"We can't compete with Wabash rates to southern points," Bill laments.

One of the best customers of the Bevier & Southern and the Burlington is the Kansas City Power & Light Company. Other B&S shipments by Burlington and other roads to Federal and private steam-generating plants.

"Coal from the Bevier vein is one of the best sources of power in the country," says Bill.

The B&S buys its fuel directly from Peabody Coal Company which operates the Bevier Mine, and gets division rates from the Burlington

and other lines for its hauling operations. About 99 percent of its freight is coal. The other one percent includes scrap from the mine and equipment for mine or railroad.

BEVIER & SOUTHERN had its beginning May 5, 1898, when the Kansas & Texas Coal Railway was incorporated with capital stock of \$100,000 in the form of 1000 shares. A line was built southward from the Burlington at Bevier to Ardmore. There it connected with a five-mile line to Excello and the Wabash, later abandoned.

In 1902, the K&T merged with a lumber-hauling shortline in Louisiana, forming the Missouri & Louisiana Railroad. Twelve years later the companies divided, with the Missouri line taking its present name. The Louisiana portion, known as the Neame, Carson & Southern, was abandoned in 1929.

Sinclair Coal Company bought the B&S from the Binkley Coal Company in 1937. Mr. Agee acquired the railroad in 1955.

Of the five shares not held by Agee, one each is held by Harry Baker, B&S vice president; Paul D. Hess, Jr., B&S secretary and general counsel; Bill Eyman, and Master Mechanic Kilgore.

The railroad was busiest in the late teens and early twenties, when it hauled passengers as well as coal. Passenger and mail service, averaging two round trips daily, ceased in 1926 when postoffices at Ardmore and Keota were discontinued. Usual consist was seven miners' cars and a coach.

The B&S has stayed with steam through the years, but in 1945 it bought three ex-Indiana Railroad electric motor cars, Nos. 200, 201 and 202, for use on a new five-mile spur to South Mine. It acquired the electrics because no additional steam motive power was available at the time. The juice experiment was abandoned in 1947 because too many traction motors burned out on the sharp grades.

No. 102, a small ex-logging locomotive, since scrapped, was used until the spur was abandoned in

1950. Another B&S locomotive, No. 107, was lost in a fire which destroyed its predecessor company's roundhouse about fifty years ago. An adjacent turntable, which was burned, was never replaced; so B&S engines always face the roundhouse, backing to the mine and dragging empties, making the return trip running forward and pulling their load.

The clear, sharp call of a steam whistle cuts through air heavy from an afternoon shower.

Her cars spotted on a storage track, No. 112 backs clear of a switch and heads in to the roundhouse, coasting gently down the steep slope. Her stack showing only a wisp of smoke, but bright embers showering from her ash pan, No. 112 eases past a tool shanty and hisses to a stop.

Engineer Cross swings down as the night hostler, Floyd Kilgore, brother of the master mechanic, clambers into the cab. At present Cross, Sligh-ton, and Weber constitute the only regular operating crew among 26 employees. Extra crews are used in section work.

The Bevier & Southern slogan, "Have Train, Will Haul," is on President Agee's business cards and on the tenders of all his locomotives, even the scale model.

Ballast Scorchers

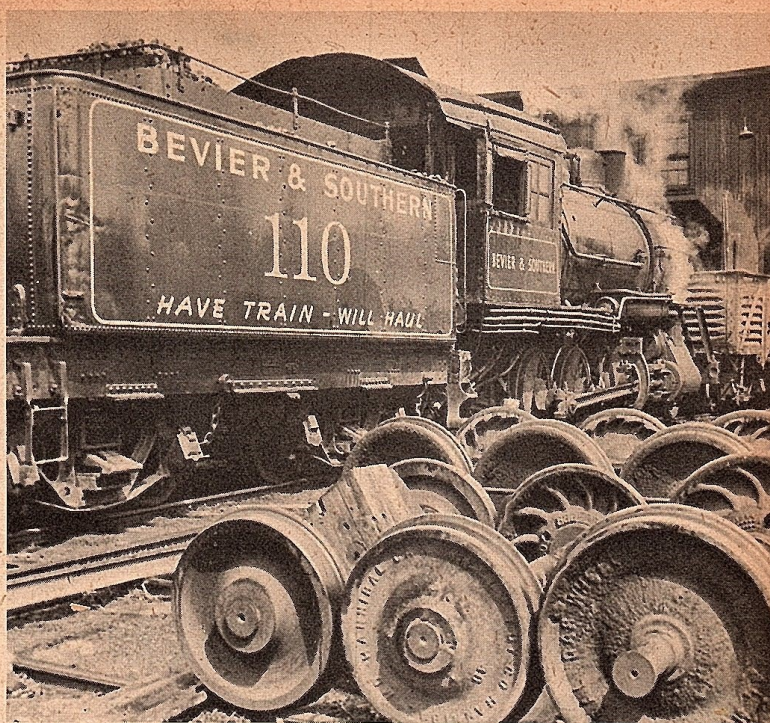
WHIPPING a hotshot eastward,
Shimmering rails are a-gleam,
Smokestack barking a lilting tune,
Primed with a full head of steam.
Drivers are whirling below me,
Pop valve is singing above,
Signals blinking a brilliant green,
Oh, this is the life I love!

Tank is half full of water,
Nearly two-thirds full of coal,
Forty-five reefers heading east;
Boy, does the old Mike roll!
Dispatcher's watching our progress,
Smiles as we burn up the line,
Getting us dope on westbound crews
Who're late on the advertised time.

Talk about office positions,
Hear that old whistle wail!
I won't trade with anyone;
Me for the roaring rail.
Give me a Mikado engine,
A night with stars above,
Forty-five cars of hotshot freight,
And I'm living the life I love.

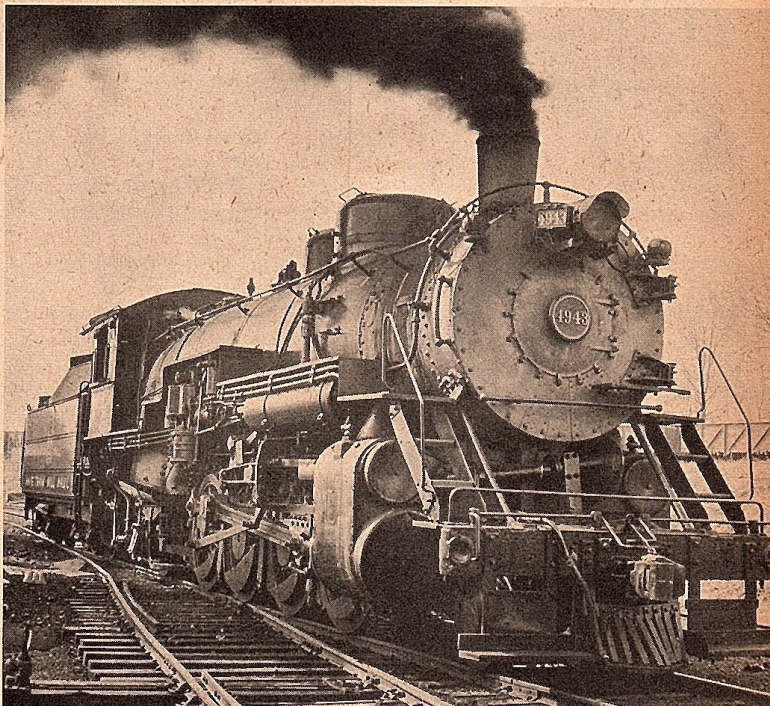
—O. Earl Lyles

OCTOBER, 1959



B&S bought 110, Baldwin vintage of 1907, from the Minneapolis & St. Louis.

Burlington mike No. 4943, Class 01A, is working for the short line on a lease.





On the day after a blizzard, while high school boys and girls were waiting in deep snow along a branch of the Fort Dodge, Des Moines & Southern for a car to pick them up, back in 1912, that car was derailed in a drift and the kids waited in vain.

Photograph by the author

Snowbound in Iowa

by AL P. BUTTS

THE MORNING after the blizzard of January 20th, 1912, was clear and cold. Northern Iowa lay buried under a thick blanket of wind-driven snow that filled the cuts along the line of the Fort Dodge, Des Moines & Southern, with only trolley wire and its supporting poles to mark the right-of-way.

I was a conductor on a turnaround passenger run between Rockwell City and Fort Dodge Junction (Hope), where we made connection with all the main-line passenger trains of the big steam roads that ran between Fort Dodge and Des Moines. At 6:45 that morning when I reported for duty at the Rockwell City depot and telephoned the dispatcher at Boone, he told me that our entire railroad was snowbound. He said the plows were out already but were not likely to reach Rockwell City before mid-afternoon.

"Better stick around, though," he said, "in case they surprise us."

My regular assignment, No. 50, was a straight 1200-volt car equipped

with new 36-inch wheels and rebuilt for passenger service. Originally freight motor No. 100, she could handle ten to twelve carloads of coal easily on level track and was fast as well as powerful. Being of center-door construction, she had a snowplow attached to each pilot, enabling her to push through drifts up to six feet high.

Passenger traffic in those days was heavy and a large crowd was milling around the station, wondering when they could travel. I knew, too, that the high school boys and girls, bundled in overcoats, boots, and galoshes, would be standing in the deep snow beside the track all along the line, looking hopefully for the car to take them to school.

While I was killing time at the depot with my motorman, Elmer Thornton, we worried about those children. Elmer had a suggestion.

"What do you say we start out now, without waiting for the plow to break through? If we're careful and take our time, maybe we can

clear the track as far as Rinard (eight miles east) and pick up the school kids and bring them to Rockwell City in time for their classes."

"It's worth a try," I said.

But we didn't tell the dispatcher about our scheme, lest he sew us up with an annulment order. Before leaving, we loaded the section foreman and his crew of five men into our baggage compartment, along with their snow-shoveling equipment. Then we pulled out of town.

We were lucky in having hot power and bright lights — nothing else was using the road west of the power plant at Fraser. The entire line was ours. It gave us a feeling of elation. Not a worry in the world! We whistled for the plant, the tower man gave us the board, and we bumped over the Milwaukee and Illinois Central crossings.

In the first mile we hit a couple of moderate-sized drifts, and great billows of snow shot up to a height of thirty feet on both sides of the track, fanning out to the right-of-way

fences! Such moments you never forget. Even after the lapse of almost a half-century, the remembrance of that sight still fascinates me.

But as we tipped over Lake Creek Hill, our hearts sank. There, blocking our path, we saw an immense drift at least five feet deep stretching ahead for about two hundred yards, a veritable world of whiteness!

Elmer pulled up, surveyed the situation, and said he thought he could make it. I had brought my camera along. Here, I decided, was a good chance to get an action shot. Climbing out of the car, I waded through soft snow to the right-of-way fence. There I set up my camera, facing the point where the drift seemed to be most formidable. With a bright sun at my mack, the light was good.

Car No. 50 backed up about a quarter-mile and whistled off. Elmer gave her everything. That old converted freight motor must have hit the drift at fifty miles per hour. In that instant she was engulfed by a cloud of glistening snow so vast that I couldn't see even the trolley pole.

Well, I took a picture, just what I'd wanted. In all my years of interurban service after that I was never able to duplicate it, for we never again had time for horseplay while running on schedule. As the car reversed to pick me up, I snapped another photograph but this time without the flying snow.

Our success in bucking a drift made us feel fine. We began climbing the hill east of the bridge. About halfway up, we met another snow pile, maybe four feet deep and about four hundred feet long, packed hard. Once more Elmer threw her into reverse. Back at the bridge, he whistled off and gave her all the power he had. She was making about forty when we rammed the drift.

The snow we penetrated gradually slowed us down to a crawl, and finally, with huge gobs of whiteness piled against our front windows, we stalled in the drift. At first Elmer felt sure he could pull us out, as the car was built for strength and we had a lot of power. He reversed, but we did not budge.

As we sat there helplessly one of

the section men observed that we were not headed straight down the track but toward a farmhouse north of the branch. A dismal suspicion arose. Could it be possible that we had jumped the steel? Yes, it could. When we got out to size things up, we discovered that our front drawbar was at least six feet north of the center of track!

Well, the school kids would have to wait. There was no help in sight, and the dispatcher at Boone was under the delusion that we were still sitting around the Rockwell City depot waiting for the snowplow.

Something had to be done, and fast. I asked the section men to dig out around the car for several feet so we could use the rerailing frogs and also to shovel away the snow for a couple of car-lengths ahead, the idea being that when help showed up they'd have at least a clean rail to work on.

As for me, I hoofed back ruefully for two miles through the snow to Rockwell City and arrived exhausted, wet with perspiration, and fearful of losing my job. But I had to face the music. I called Boone, and the dispatcher answered. I said I wanted to talk with Mr. Crooks, the general manager. The dispatcher asked, "Is it important?"

"Yes," I said, "very important."

A moment later the GM asked: "What's on your mind, Al?"

"Mr. Crooks," I blured out, "we're in trouble," and I told him the details. "We need help right away to get back on the track."

"Not a chance," he said. "We couldn't get a plow to that point before nightfall."

I gulped. "Mr. Crooks, there's a Milwaukee local switching in that vicinity around this time. Would it be all right if I get their crew to pull us back on the rails?"

"Yes," he said, "that's a good idea. I'll call Van Fleet, the Milwaukee superintendent at Des Moines."

About an hour later a big Milwaukee steam engine, pulling a caboose, stopped in front of our depot. The conductor came over and asked, "Where's the interurban car that needs rerailing?"

I told him, adding: "We don't need orders, because there's nothing else on the line. I'll pilot you out to the scene."

Thereupon I went down and lined up the transfer switch. The Milwaukee engineer backed cautiously, but had no trouble at all, for the plow on Car 50 had cleared the track fairly well. Reaching the spot, his conductor said that our section men had done a god job of clearing away the snow. Just before they coupled onto our car, I asked all hands to pose for a picture in front of it, which they did.

After that, it took the steam engine only two pulls to get us back to normal. The first pull lined up our front trucks with the rails. Then we placed the two rerailing frogs and they both held, and almost immediately she was on the track again.

That night, our snowplow got through and put the Fort Dodge, Des Moines & Southern back in the business of carrying passengers and freight. Elmer Thornton and I knew we had broken the rules and we expected to be fired for it. But we didn't get so much as a reprimand or a brownie. In fact, the Old Man never even mentioned the matter to me. I have often wondered why.

Eventually I finished nearly forty-eight years on the Fort Dodge railroad and am now living in retirement at 1321 Fifth Avenue North, Des Moines, Iowa. If you liked my story I wish you'd drop me a line. Elmer also worked out his years on the interrurban. Afterward, he built many small-size steam locomotives for use at various points from Duluth to Florida. He was operating one of them at the Iowa State Fair around the time he died.

Looking at the photographs I took that cold January day in 1912 when we were snowbound evokes memories. The Milwaukee steam engine pulled our car back to Rockwell City from the derailment scene and we cut off at the transfer switch. When I thanked their conductor he said: "Oh, that's all right. Maybe some day you'll return the favor."

As a matter of fact I did, years later, but that's another story. ●

Wild Hoggers and

There Was Reckless Running on Oldtime Logging Roads in the South;

IF YOU are not familiar with Florida you could enter the state, circle it, and leave without seeing a hill worth running at, but there are a few steep ones that used to be racetracks for the log-train men. Oldtime log trucks in Florida or Georgia were built without brakes, and when a hogger once got them rolling over a hill, if he stayed on the iron, he went somewhere.

Back in 1918, when West Bay Lumber Company was operating in Washington County their tracks branched off the Birmingham, Columbus & St. Andrews main line at Gothie, ten miles out of Southport, where the big tooth-picks went into the bay. From the switch at Gothie, their slim rails dropped down almost straight to a trestle across a deep neck of River Lake and climbed another grade just as steep.

Of the three engines the West Bay owned, none could drag more than one car at a time up River Lake Hill. Every train crossing the valley had to be run out at express speed, and the best engine on the job was No. 4, a high-wheeled American type built in the seventies. Once when a car was wrecked on the trestle and went overboard, the 4-spot could not handle the equipment necessary to pick it up, and the car was left in the lake for future generations to wonder about.

Among the most dangerous men on any railroad in the old days were wild engineers and short-flag artists. Put together, they spell trouble. In the West Bay section of Florida, you can see deep, round, limesink valleys known as doodle holes. Track was laid through them, but all loading had to be done on high ground, as the loads had to be run out. To stick in a doodle hole was not exactly fun. The hills were too short and the trains too long to back up or rock out.

I remember the time a work train on the West Bay road, wheeled by a low-wheeled Mogul, lost a keg of spikes in a doodle hole and because the log train was close behind it left the keg beside the track for several hours.

Pulling out of camp that afternoon, the work-train hogger figured he was several minutes ahead of the log train

and he took a chance by stopping to pick up the keg of spikes without calling out a flag.

But the log train man with the high-wheeled 4-spot did not mean to be caught napping in a doodle hole. Just as the keg was thrown back onto the too car, the racing log train shot over the hill to unload it again, crippling several men and almost killing the loading team which had their own car in the log train.

Five years before that, the West Bay trains had been hauling logs out of Wausau, some 25 miles from Southport. As Wausau was the only station on the line with a depot and agent, the log trains usually received orders by telephone. One day No. 5, a forty-ton Davenport Mogul, dragged her train of logs out on the main line at Wausau. The agent, Curtis Jones, wrote out her orders calling for a meet with the passenger train at Riverside, a blind siding eleven miles below.

Jones stepped out on the platform to hand up the flimsies, but the engine roared by in a cloud of dust and black pines smoke with no hand of a crew member outstretched. The agent could hardly believe his eyes when he saw the train left standing on the main line. Seated on the tank manhole cover of the receding locomotive was the engineer, Owen Spels, waving a gun and shouting!

Jones rushed inside and cranked the wall telephone. "Southport," he yelled into it, "where is the passenger?"

"Just getting out," was the answer. "She will meet Five at Riverside."

"Not this time," Jones shouted. "Hold her!"

The receiver banged as the Southport agent threw it down and Jones heard the muffled thump of running feet. Then the wire came alive again.

"What's wrong?" Southport asked.

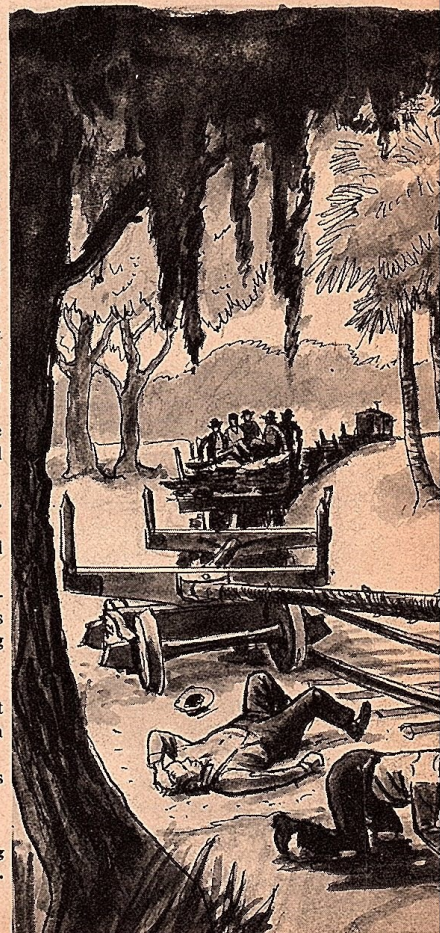
"I wish I knew," said Jones. "He left his train behind and went out of town like hell without orders."

Another voice spoke up. "This is

Conductor Campbell. What's going on up there and where is Four?"

"Four is safe in the woods," said Jones. "But I wish I knew where Three is."

Three was the work train that I was pulling, but nobody knew at the time that we were already in the hole at Gothie, waiting for the passenger. We had no inkling of anything wrong until No. 5 dashed by, her rods only a blur. Back in his cab the hogger threw up a hand at us, but that told us nothing except that he was either drunk or crazy; and we were still wondering when he slid his drivers to a stop at



A truck jumped the track, ditching two wise guys who'd hitched a ride.

No Brakes by E. A. ("Frog") Smith

and Uncle Will, Carrying a Gang of Convicts, Set a Speed Record for 35-Pound Rail

Southport. Then he staggered from the gangway into the arms of the waiting super, who fired him on the spot and handed him over to the town marshal.

Following him to the platform came the Negro fireman, still shaking in his shoes. "Befo' God, Mistah Campbell," he told the conductor, "I sho' thought we'd hit you 'fore we got here."

"And you almost did," said the con. "Why didn't you flood your boiler or let the steam go down?"

"Naw suh, not me," said the ashcat. "Not when there's a .44 pointing at my back."

Then the truth came out. Owen Spels

had picked up some "white mule" in the woods and was reeking of alcohol when he rolled into Wausau. In a hurry to see his girl, he had pulled the pin on his train and his gun on the fireman. Ordering him to "keep her hot," Bill hooked the lever well up, yanked the throttle wide open, and kept her like that all the way in. He didn't know what else might be on the line or that he was on the passenger train's time.

The soused hogger was put in the calaboose while the agent called Wausau to tell Jones what had happened. Thus ended the railroad career of a wild and irresponsible hogger.

BUT there were others. One warm spring morning in 1910, when the palmetto trees were in blossom and wild honeysuckle scented the air and I was a young squirt pulling the throttle on trains of the Big Otter Creek Lumber Company, I took a string of cars out with No. 127 to the logging camp in Levy County, Florida. I had climbed down and was oiling around when the superintendent came by.

He said: "We've got a new engineer to run the 15," referring to an Eight-wheeler that dated back to the seventies. "Name's Stiguels. I hope he sticks with it. I'm fed up with boomers."

Drawn by Joe Easley



"What's the matter with those fellows?" I asked. "Nobody stays on that run more than a few days before he quits or tears up something and gets fired."

"Poor eyesight," grunted the super. "This 35-pound rail looks so much like ninety to them that they forget our schedule is eight miles per hour. Listen, Frog, you want to try that run for a change?"

"No, thanks," I said, poking my long-spouted oilcan under my engine. "I know when I'm well off. Number 127 is one of the best 4-4-0's that ever came out of Jacksonville."

I saw Stiguels looking over the 15. He was a tall, scrawny man of about fifty with a weather-beaten face and a handlebar moustache, dressed more like a farmer than a railroad man.

He looked honest enough. I never dreamed he had pulled the super's leg. When he'd told the Old Man he was an engineer, with papers to prove it, he was hired at face value. But one thing Stiguels did not explain. His papers were Marine and he had never run a locomotive in his life.

He eyed the Eight-wheeler critically, counted two cylinders, four side-rods, and two injectors, and said he guessed he could run her all right.

Although the railroad was chartered as the Otter Creek & Southern, its main line was mostly ungraded, with very little surfacing, of which the spur tracks had none at all. The tracklaying foreman, Guy Landham, simply placed the ties flat on the ground through mud holes and cypress ponds and over or around big clumps of saw palmetto, with the result that the little engines did acrobatics like a circus performer.

My tie-train being extra, I had to keep clear of the more important log trains, so I waited in a sidetrack while the log trains did their switching. As soon as No. 10, a Rogers Eight-wheeler, coupled to her loads and whistled off for the mill, the new man came out of the hole to pick up the empties and back them deep into the almost primeval Florida forest. Right there the fun began.

Our company operated two long log trains consisting of bastard cars, each car being two four-wheel sections coupled in front and back in primitive fashion by thirty-foot pine poles. Only the last car boasted a skeleton frame and centerplate. It also had standard 33-inch wheels, raising the last car so it could be seen over the other cars, which

had 28-inch wheels. The train stretched out to a length unreasonable for reversing.

Being unfamiliar with locomotives, the new man backed into the long pole-coupled train with a crash that almost jarred the last car off its centerplates. And when the flagman riding the rear waved him back, Stiguels answered in true steamboat style, full speed astern!

Engine 15 answered her throttle by zipping through cypress ponds and around palmetto clumps at a dangerous speed. The seatboxes were bucking crazily as the exhaust changed from a chuckle to a steady roar. Slamming up and down like a loose side-rod, the deck apron set up a clamor that made conversation in the cab impossible.

Frank Goodman, the colored fireman, could not keep his feet in the jolting cab. Bracing himself against the cab wall, he watched the steam gage and wondered how much of his carefully-built fire was still on the grates. He and the other woodsmen on board gazed helplessly at the engineer.

Stiguels did not see them. His eyes were riveted on the long train of flimsy log trucks that writhed like a snake as he backed wildly around blind curves and over cribbed trestles, splashing mud far and wide into the palmettoes.

On the other end of the speeding train, the flagman decided they had a lunatic at the throttle, and he began looking for a safe place to unload. When they came to a sandy wagon-road crossing, he leaped and rolled clear.

Seeing the flagman take wings, Stiguels slammed the throttle shut and his brakes into emergency. Only the fact that the tank brakes failed to work kept him from jerking the train to pieces. As it was, the drivers were still sliding when they reached the crossing, and there the flagman climbed aboard the engine.

By that time the deck apron had quieted down, and the fireman found his tongue. "Mr. Stiguels," he asked, "ain't nobody ever tole you we cain't run more'n eight miles an hour over this road?"

"What do you mean *cain't*?" the sand-covered flagman piped up. "He was damn sure making fifty when I joined the birds."

"Eight knots, I mean, eight miles," stammered the throttle-jerker.

Then he admitted sheepishly that this was the first time he had ever ran anything other than a steamboat engine. The crew burst into loud gaffaws, but

Stiguels took it in good spirits, even managing a faint grin. He asked their advice and followed it. It didn't take long after that for Paul Stiguels to become a good log-train man.

ONE MORNING when our train arrived from the mill, the flatcar on which the woods crew rode was loaded with slabs to be used in firing the locomotive. Two men, who considered themselves smart, refused to ride on the slippery slabs and hitched a ride on the first bastard truck in the train. That truck was the only one to jump the track that morning, and it happened near that same road crossing. Both wise boys received a severe jolting, and though neither one was hurt, they had to walk back to camp for clean overalls.

Many a gray-haired hogger on a trunk line, with his brow wrinkled from reading timecards and train orders, has gazed wistfully at a little 4-4-0 coupled peacefully to a log train, noting the casual indifference with which the engineer lolled in his seat or spotted a car. The man who worked for a big railroad would see that the tender was long enough to carry a fishing pole and he'd wonder why in hell he himself couldn't be one of the lucky guys on a woden-axle pike "where nothing ever happens."

The man who thinks that nothing ever happens on a timber road should have been with us at Hopkins, Florida, one cold December day in 1928. Hopkins is far down the East Coast where it's supposed to be sunny and warm the year 'round.

At that time we were working hard to get the big logging job going again after a four-year shutdown and everything had to be rebuilt. Standing in the weed-grown yard were six rusty locomotives, three of which the Hartford Casualty Insurance agent had condemned. Two more were being repaired.

As for the other, a dilapidated little 0-4-0 with a barrell stack and a home-made cab, the insurance man discreetly kept out of her reach. With mud banked up to her tubes, the hogger was afraid to wash out her boiler for fear of starting new leaks. But at that time she was the only switcher we had, and Engineer George Davis did the best he could with her.

I also have good cause to remember that old girl. One morning a few days later I ran her—and then she blew up!

That December day was a spell of

bad luck I'll never forget. It dawned warm, with light rain slanting across the busy yard. Groaning in every joint, the 0-4-0 crawled out in a fog of her own steam, taking the newly-rebuilt pile-driver over to the St. John's River trestle.

I was slated to run the 4-spot as soon as the road resumed operation. That morning, with a helper, I was reaming crown-bolt holes high atop the Baldwin Ten-wheeler's firebox.

My helper gave a look as the dinky clanked out of the yard and he said, "If the track through Cat Head Swamp is as slick as this boiler top he'll never make it to the river."

"Maybe not," I said, "but you'd better watch your own step instead of his."

The warning came too late. My helper instantly lost his feet and the big air motor threw us both headlong to the ground, then wound itself up in the hose. Luckily, neither of us were badly hurt, but it was not a good way to start a day.

Before noon the warm rain had changed to a fierce northeaster howling in from the gray Atlantic Ocean. No one in our crew had worn a coat that day, not even the company's president, W. E. Foshee, who was making the trip with us to test a new pile-driver. Mr. Foshee learned plenty.

By the time we had jockeyed the new piece of equipment into position to drive piles into a bent, the gale was blowing so hard that it made us numb with cold. We built a roaring fire with old ties and huddled around it, ignoring the fact that the big boss was along. While we were trying to warm ourselves, the new pile-driver leaned over the first time its hammer shot up the leads, and fell on its side with a heavy thud.

As soon as an order could be heard above the din of profanity that followed the derailment, President Foshee sent a man back to fetch the track gang. After a long wait, while the weather grew steadily worse, the gandy dancers showed up—with more bad news. Nineteen men had piled onto one motorcar and the *put-put* had thrown a wheel, scattering men, tools, and lunch pails along the track. Mr. Foshee, chilled and wet, angry and disgusted, told us all to knock off for the day, and we climbed aboard the dinky for a cold ride home.

Backing up in the face of a northeaster without a coat or other protection was nasty and miserable. George Davis eased the Manhattan engine over

the rotten track at maybe ten miles per hour. Mr. Foshee stood it as long as he could and then asked through chattering teeth, "Can't this damn thing run any faster?"

"I'm afraid not," said the hogger, leisurely filling his cornco pipe.

His slow movements irked Mr. Foshee, who swore and reached for the throttle.

"I'll take her, George," he said. "We've gotta get back before we all freeze."

"We sure do," he agreed.

Davis lit his pipe and hid a grin with its smoke while the boss latched the throttle all the way out and stuck both hands into his pockets.

Smiles of cold approval went around the crowd, but they faded after less than a mile as the ancient scrap-pile began throwing things. Both crosshead slide bearings or "gibs" went out of the right side, and the piston bent into a rainbow, tearing out the rod packing. With the jamming of the piston, a rod let go and demolished the valve gear. All in all, she was a sorry mess as she rolled to a stop.

Davis shut off steam before the big chief could get his hands out of his pockets. Then he walked back far enough to pick up his tools that had sifted out of the cab. With them he took down what was left of the crippled side and patched the other side. Meanwhile, the rest of the men made a fire from old ties in an effort to get warm.

Mr. Foshee had no desire to run the dinky again. He let Davis bring her in, not even griping when she stopped on dead center at the scene of the motorcar wreck. Anyway, we had enough men available on company time to push her off.

Cold rain and wind were still lashing the Florida countryside when the weary crew finally limped into the yard just before quitting time, with the three-wheeled motor car chained to the drawhead.

SHORTLY after that I pulled another boner to finish a day of hard luck. When the rain drove us to cover, I had my helper turn a tub over the smoke-stack while I rigged an air motor to roll the tubes in the front end. And when there was no longer any danger of being reamed out by a tap four feet long, a boilermaker named Sweringen began rolling in the ferrules in the firebox end.

I had set up an Ingersoll-Rand air motor with the exhaust beside the spin-

dle. When I gave her the air, I cleaned out about half the tubes right into Sweringen's face. He diver out the fire-door with a yell you could have heard for blocks.

Bright and early the next day we put the dinky back together, but it was wasted effort. She blew up a week later, Davis's cob pipe being the only casualty. He stepped on it as he dashed out of the gangway.

I believe I was the only man at Hopkins who appreciated the Manhattan engine for what she had been in years gone by. I'd known the short-coupled little gal when I was a kid at Hansell, Georgia, back in 1902. And my father's younger brother, Will Smith, who is still living, was her engineer.

One day a freight train of the Atlantic Coast Line stopped at Hansell to pick up a carload of lumber. As the train was headed south and the siding opened north, Engineer Pete MacDonald eased the big Twelve-wheeler down past the car to shove it out with a car stanchion.

Just then the Manhattan hove into view. She was fairly new and still wearing the glassed-in cab that city slickers had given her for service on one of New York's elevated lines before she was sold into logging-road slavery. At the throttle sat my Uncle Will, grinning through his dark walrus mustache.

"Never mind the pole, Uncle Peter!" he shouted from the dinky's cab window. "I'll kick the car into the train for you."

And so he did, in a manner fit to make the main-line crew jealous. No sooner was the car tied onto the train than he threw the dinky's lever into the corner and yanked the throttle all the way out. Being in tiptop condition, with all her weight on four small drivers, she scooted back into the hole faster than any modern diesel could have done.

"Thanks!" MacDonald yelled from the big engine's cab while the eyes of the train crew widened in surprise. Never had they seen an engine move so fast, and certainly not the big Mastodon type like the one on the smoky end of their own train.

At that time the Atlantic Coast Line owned several heavy Twelve-wheelers which they used mostly on freight but occasionally in passenger service too. One such occasion was on my own wedding trip in 1918. The passenger engine broke down after leaving Waycross, Georgia, and my bride and I spent our wedding night sitting in the

depot waiting-room at Boston, Georgia. Our train arrived five hours late because it was headed by one of the lumbering Twelve-wheelers.

IN THOSE days the sawmill at Hantsell was owned by a man named Jasper Carter but was leased to D. W. Rogers, who owned the dinky and most of the logging equipment. When Rogers' lease expired, Carter refused to renew it or buy his engine. Instead, he bought an old, worn-out Eight-wheeler with four six-foot drivers and not much else except plenty of leaks. And one of those many leaks I can never forget. It came from a dome rivet under the jacket and blew steam straight back into the engineer's face.

Delivered cold because the Atlantic Coast Line men refused to have her on the high iron under steam, she was sorry-looking. Her sand pipes had long since rusted away and her tires were worn so badly that they appeared to have double flanges. Under steam she slipped and danced so that she was given the nickname of "Old Legs."

"What do you think of her?" Rogers asked Uncle Will dubiously.

Uncle Will snorted. "I hope I can find all of her after a trip or two over One-Mile Hill."

One-Mile Hill was the steepest grade on the line. Uncle Will hated to give up, so with misgivings he set out to haul enough logs to keep the mill running while Rogers ran his own engine to pick up his equipment.

With twice the weight but only half the power, the teapot stuck on One-Mile Hill every trip with the same train that the Manhattan had been handling with ease, and Uncle Will became more and more disgusted.

Whenever she slipped, Rogers generously gave help, but the day finally came when Uncle Will refused to accept help.

"No," he told Rogers, "this time she takes her train or I leave her here."

With that he slammed the lever into the corner and backed to the top of the hill he had just crawled over. While the fireman blew her hot, Uncle Will did something not on the books; he screwed the pops down to boost the pressure from 110 to 135. Then he shoved sand onto the rail. When the pops began to sing at the advanced pressure, he dropped the lever into the Amen corner and gave Old Legs everything she had.

With the loads shoving, she shot away down the hill like a comet; but before

they were halfway up the big hill, Uncle Will saw he had overdone it.

Fighting to stay on his bouncing seatbox, he blew Rogers ahead. He saw smoke belch from the dinky's stove-pipe stack, but she failed to move fast enough. With no brake on train or engine, the junk-pile topped the big hill within sight of the mill at express-train speed. Then Uncle Will reversed and began plugging her cylinders with steam.

Rogers was praying as he shot past the mill with the Manhattan wide open and with Old Legs, her drivers spinning madly in reverse, almost on top of him!

At length, Rogers' frantic prayer bore fruit. Recalling that Old Legs carried no sand, he began working both his own levers in the hope that enough sand would remain on the quivering rail to stop the runaway.

At the end of track Rogers stopped with his pilot sticking out over the pond, and he jumped. Picking himself up from the mud, he sighed with relief as Old Legs, her drivers spitting fire, took hold on the sand and halted less than ten feet from his own engine!

"Will," the old man said soberly as he waded out of the pond, "you climb down off that damned scrap-pile and stay off!"

IT WAS at Sibley that Uncle Will pulled one of the wildest stunts ever seen on a logging road. The sawmill company was using leased convict labor for building railroad and bridges, hauling them to and from their work on the locomotive's tender. And the law read that the men in striped suits must be in from the woods by six p.m.

That day Dad worked in the machine shop while Will took the train out as he had done many times before. He was not quite loaded but was oiling around when the convict guard herded his sweaty charges into the tender.

"All right, boys, time to go in."

"I know it," said Will, "but if you'll wait a few minutes, we can take the train in and let the loading team and crew go home at the same time."

This was logical, but the guard wanted to show his authority.

"Damn the loading team and you too!" he yelled at the helpless young hogger. "I'm the boss around here."

The Negro fireman, who weighed about 200 pounds, looked to the kid for some signal to throw the guard into the ditch, but Will took it quietly. He had a better plan to teach the guard a lesson.

Holding the train until the last lag had gone up the skid poles and the stanchions had been placed, he reached for the whistle cord and gave a long-drawn-out call for a highball. The instant the white flag went up on the last car, he answered with two short toots and gave the high-wheeled engine steam.

Swearing again at Uncle Will, the guard angrily showed his watch, saying: "You'll catch hell for this. It's six miles to the mill and it's now five minutes to six. We'll never make it."

"We'll be there," was the hogger's only comment as he latched the lever down and the throttle out.

One thing the Sibley mill owned was a good Eight-wheeler. My father kept her that way most of the time and often bawled out Will for shaking her to pieces. But that day my uncle didn't give a hoot how mad anybody got. He was plenty sore.

Rolling away from the ramp on a downgrade, he worked the throttle wide open and there it stayed. He let the lever out a few notches on the hills, and on the down grades he hooked her up and did she ramble!

Soon her four slender rods became a blur while a steady stream of hot sparks rained on the convicts, tired from the day's work and huddled in the tender. Usually they were happy when going in for the night, but that afternoon they were scared.

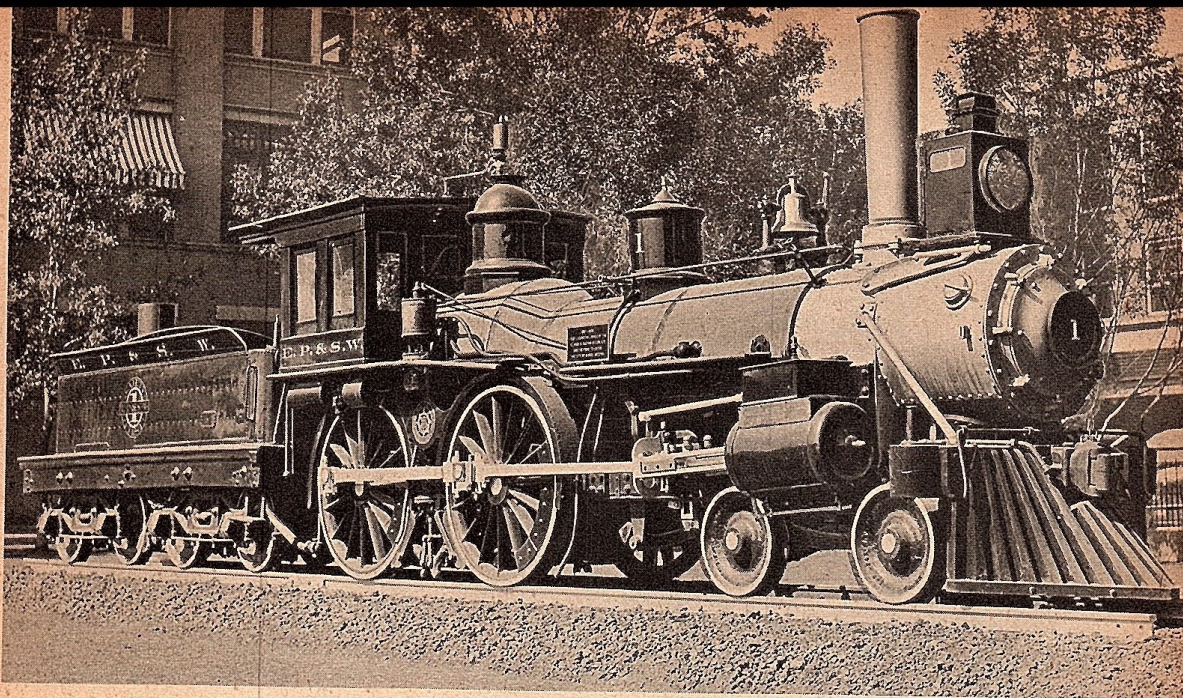
Two miles from the mill a wooden trestle spanned Burnt Sock Creek with a steep hill on either side. When the flying engine struck it, the trestle shook as if about to collapse.

Uncle Will kept his eyes on the track ahead while the poor convicts were on their knees in the swaying tender, praying. As for the guard who had caused all the trouble, he had long since laid his gun aside and was hanging on to the tank brake-wheel.

Gently as link and pin couplings can, the train came to a stop at the unloading ways, and Uncle Will asked, "What time is it?"

With a shaking hand the guard fumbled for his watch. It said exactly six!

They had made the six-mile run, starting and stopping, in five minutes! One pilot journal box had caught fire and there were half a dozen blazers among the three-inch journals back in the train. This, I think, was a record run for 35-pound rail that has never been beaten. It showed what wild hoggers could do—and did—with or without brakes. ●



Back home in El Paso, Texas, with her firebox cold, her driving wheels forever still, El Paso & South Western's old One-spot seems to be dreaming of past glory: one of the many iron horses you can see in parks and museums of U.S. and Canada.

Steam Engines on Display

by JIM SCRIBBINS

Assisted by Homer G. Benton

THE STEAM LOCOMOTIVE, to paraphrase the words of old Jim Hill, has made its mark upon the face of the earth and nobody can ever wipe it out.

True, Rudolf Diesel's invention has done a pretty thorough job of wiping out *active* steam. All over North America you look hard for a billowing smoke plume rising from a locomotive stack. In Eastern Canada, where the die-hards put up a gallant fight, their number is dwindling almost hourly. Elsewhere, what do you see? Practically nothing but a few small and widely scattered industrial lines that still use a little steam or maybe hold an O-6-0 switcher in stand-by service.

There are also a handful of recreation-type roads that operate coalburners—roads like the Black Hills Central, the Edaville, the Tweetsie, the Pine Creek, the Rail City operating museum, and

the one at Travel Town in Los Angeles—and these, we are proud to say, are very much alive. You'll enjoy riding them, one by one, and taking pictures of them.

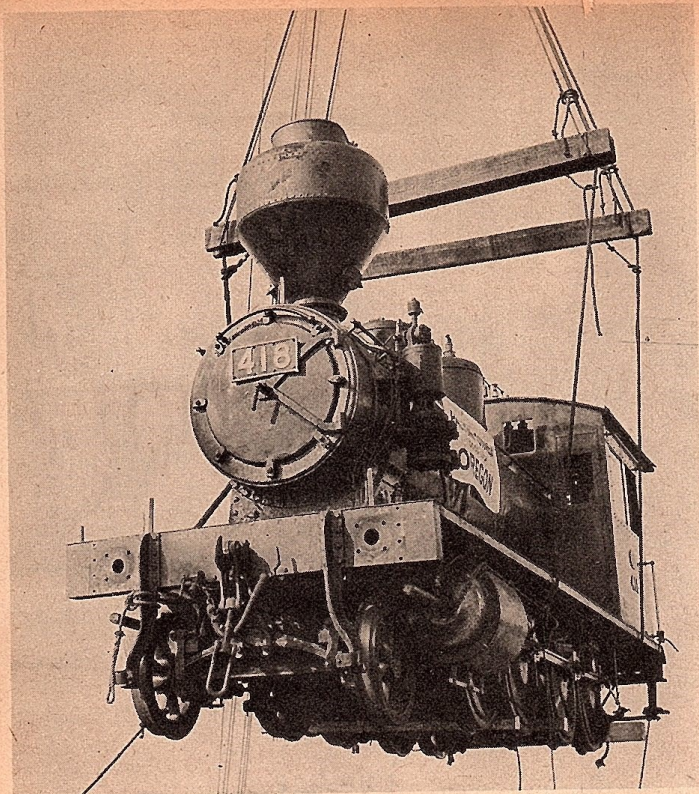
So much for *active* steam. In addition, we have a large and impressive assortment of iron horses that will never again pull a train but will, for the most part, remain on display through many a lifetime. You'll find them in parks and museums and depots throughout the United States and Canada in almost every state and province. They are monuments of an era that will never die.

Readers will be surprised to learn how very many retired steam locomotives can be seen and photographed. To the oldtimers they recall memories. To the rest of us they are relics of a recent past, elements of America's greatness. Even though their fireboxes are cold

and their throttles rusty from disuse, we recreate in our minds the days when they pulled the Fast Mail or drag freight. We visualize them wheeling a string of cars across the wheat belt, or climbing a mountain grade with thunderous exhaust, or rolling to a stop near an interlocking tower. Ah, those were the days!

In answer to numerous requests, we have compiled a detailed list of retired steamers on display north of the Mexican border. Nearly all of them were donated by railroad companies to on-line communities or preserved for posterity by the roads themselves. The list is not complete. Some facts were not readily available to us. The editor of *Railroad Magazine* will be glad to get additional data from readers for use in a future issue.

Canadian National stipulates that all of the engines it donates to cities or



Woodburner from Finland arrives in America for display in Oregon's Centennial this summer, after which she will be installed in Railway Museum at Portland, Ore.

towns must be well maintained by the recipients, including repainting when needed, but does not insist upon protective fencing. Our list uses the initial F for locomotives that have such fencing.

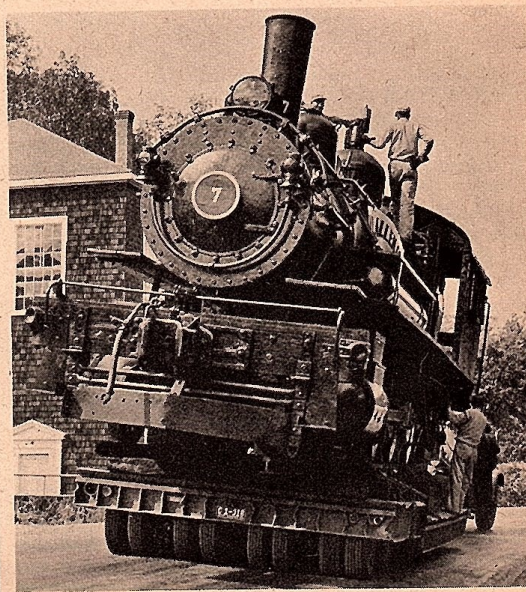
Great Northern tells us that all of its "gifts" are fenced and are kept in good condition by the communities according to terms of the gift. Its *William Crooks*, while not fenced, is quite safe inside the waiting-room of St. Paul Union Depot.

Three engines from the Milwaukee Road are adequately fenced, and one of them eventually will be housed. The City of Milwaukee has done an excellent job of caring for its 4-8-4, Class S-3, surrounding her with a cyclone fence topped with barbed wire. It also placed wire mesh over the cab windows as well as screening the headlight and number plates. When, in spite of all these precautions, some glass was broken last summer it was soon replaced.

Milwaukee's museum staff even created lifelike figures of an engineer and fireman to man the cab. At night, floodlights illuminate the landscaped area, the headlight burns dimly, and a red warning light and green classification lamps are displayed. In our opinion, these arrangements represent the ultimate in how to exhibit a locomotive in a park.

A contest was held among local

David Plovden, 1239 Madison Ave., New York City



Two photos by O. Winston Link, 88 E. 34th St., New York City

Moving Norfolk & Western No. 7, Class G. to park in Bluefield, W. Va., was operating problem for adults, fun for kids.

school children to name the S-3. The winning name, "Old Smoky," was submitted by Charles Schmidt, son of a member of the National Railway Historical Society, Wisconsin Chapter.

Canton, Hammond, and Indianapolis agreed to fence and maintain their Nickel Plate locomotives. Soo Line demanded that a cyclone fence topped with two strands of barbed wire protect the engines it gave away, also that the receiving city or organization not allow them to become faded or rusty.

Northern Pacific stipulated that the 55 locomotives it donated for exhibition be maintained perpetually by the receiving city or county. Some have protective fences; others stand in playgrounds, with attached hand-rails enabling the children to play on them.

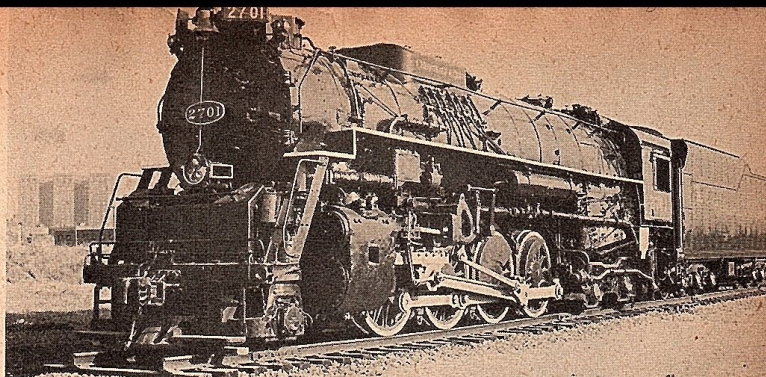
Not even a fence is sure-fire protection. Norfolk & Western tells us that even though its little Consolidations in Bluefield and Roanoke are fenced, they have sustained considerable damage from vandals. Abingdon contemplates both a fence and a shed to safeguard its 4-0-0 of *Mixed Train* fame, and we hope the plans don't bog down.

As H. L. Kelso pointed out in a recent article, the Texas & Pacific's 658, a 2-10-4 type, presented to the Texas State Fair Association at Dallas, was desecrated so badly that she had to be scrapped. T&P then imported a New York Central Mohawk as a replacement. A sister T&P engine, No. 610, located at the Southwestern Exposition and Fat Stock Show in Fort Worth has had better luck—we hope.

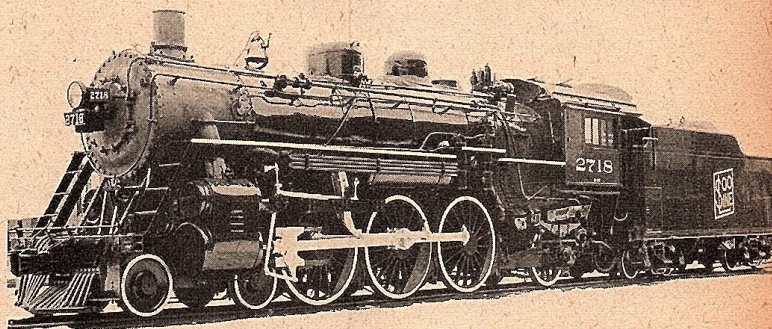
William C. Kessel offers the doleful news that the beautiful Kanawha (Berkshire type) that the Chesapeake & Ohio donated to the City of Buffalo was left unguarded on a short stretch of track near the waterfront and was wrecked so badly by souvenir hunters that she had to be sold for scrap.

"Trouble was," Bill comments, "that a police car needed five minutes to reach the locomotive by a roundabout route while vandals could run through the grass to the same spot in as many seconds. The handsome Kanawha had not been installed on public display for a week before she had lost all of her glass. Locomotive seatboxes were fouled by human excrement. Everything that could be removed by equipment short of a blow-torch was taken from the unhappy engine. A fence might have saved her."

But some engines have done well
(Continued on page 48)

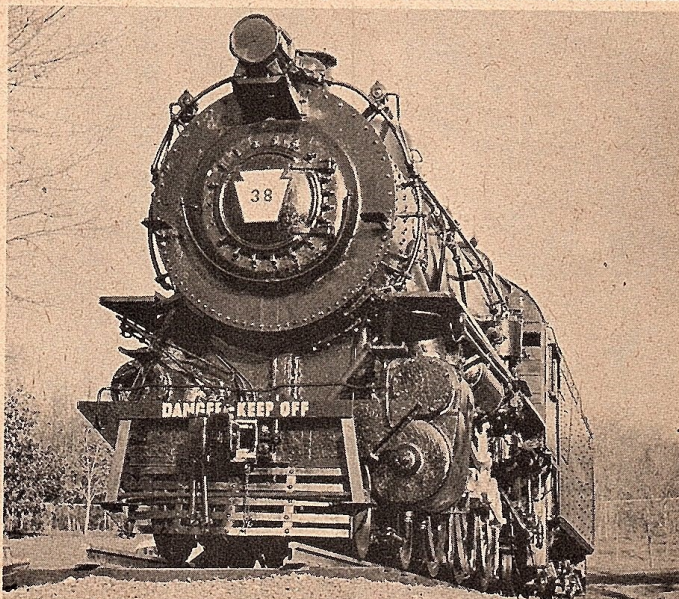


Chesapeake & Ohio presented a fine Berkshire type, No. 2701, to the City of Buffalo, N. Y. Souvenir-hunting vandals wrecked her so she had to be scrapped.
Joseph A. Fortuna, 306 Landson St., Buffalo, N.Y.



from Burdell L. Bulgrin, Owen, Wis.
Soo Line No. 2718, Class H-23, on exhibition at Railroad Museum, Green Bay, Wis.

Only two Long Island steam locos are preserved; No. 38 is at Stony Brook Museum.



Savas Stavropoulos, 85-46 Chevy Chase St., Jamaica, N.Y.



INFORMATION

Smoother rides for commuters and lower cost of track upkeep will result from New York Central's installation of new welded rail on about five miles of its busy Harlem Division from Botanical Garden to Mott Haven in the Bronx area of New York City. Quarter-mile lengths of continuous welded rail replace standard 39-foot lengths.

New York Central Railroad

1 (a) Now that so much of the new rail being laid is welded, why do the railroads continue to purchase rail in 39-foot lengths? (b) How do they keep welded rail from becoming an expanding snake in hot weather or stretching to breaking point by contraction in winter? (c) Has it ever been determined what is the greatest length that the mills could roll?

(a) Bob White, section foreman, Grand Trunk Western, writes:

Up to the present the first cost of welded joints has been more than the cost of bolted joints. Roads in open country with long sections of tangent track have found it successful because of the uniform slight wear under such conditions. Others in mountains and where there is a large amount of curvature seem to feel it more advantageous to use bolted joints on account of the more frequent renewals.

(b) Some roads in areas of extreme temperature change are still concerned with the anchoring of welded rail to keep track from buckling in high temperatures and, on the other hand, from pulling apart in the event of a break in low temperatures. The New York Central say that in the experience of their engineers temperature changes do not affect welded rail so drastically. A little extra anchorage is generally sufficient to keep it under control, even in areas of the country where lengths of 2,200 feet are commonly used.

(c) The rail mills of the U.S. and Canada are set up to roll 39-foot rails. Some of them can roll 66-foot rails but do so only at a premium cost to the railroads. The rail mills are not in a position to produce continuous welded rail (by welding) at the mill and frown on the job of transporting it. NY Central turns out 1,326-foot lengths in its shops in Syracuse, transports them on special flatcars—31, count 'em—to site of installation.

2 Did any American railroad ever have 6-foot gage?

Yes, indeed. The list included the Albany & Susquehanna (now D&H), 103 miles in New York State; the At-

RAILROAD

BOOTH

ASK BARBARA: Railroad questions are answered here every issue by our research expert—as many as space permits. Top priority is given to subjects that seem to be of wide general interest. Address Miss Barbara Krelmer, *Railroad Magazine*, 205 E. 42nd Street, New York 17, N. Y. No replies will be sent by mail.



lantic & Great Western (now Erie), 507 miles in New York, Pennsylvania, and Ohio; the Cincinnati, Hamilton & Dayton (now part B&O, part abandoned), 60 miles in Ohio, both 6-foot and 4 foot 10 inches; the Delaware, Lackawanna & Western, 251 miles in Pennsylvania, New York, and New Jersey; the Erie, 460 miles in New York; and the Lackawanna & Bloomsburg (now DL&W), 80 miles in Pennsylvania, both 6-foot and standard. There were many other wide gages: 5-foot, 5-foot 4 inch, 5-foot 6-inch, etc.

3 Recently I saw a boxcar bearing the name Wellsville, Addison & Galetton. What kind of road is that?

This freight line runs between Wellsville and Addison, N. Y., 82.7 miles, with a branch from Gaines Jct. to Ansonia, 8.5 miles. It has 7 diesel road locomotives, 83 freight cars.

4 Why did the Chicago Great West end passenger service?

For the same reason that many other roads dropped passenger service—the railroad can no longer compete profitably with motor vehicles.

5 Wasn't there an engine known as the "Big Liz"? What was her story?

She was an experimental Pacific built in 1910 as Alco's 50,000th locomotive, probably the first time an American locomotive builder produced an engine on its own initiative, at its own expense. Alco aimed to determine the efficiency and capability to which a passenger-hauler of standard wheel arrangement could be developed with existing conservative weight limits. The company took advantage of latest trends in design and fuel-saving devices. One weight factor was cast steel cylinders (27x28

inches), used for the first time on any locomotive.

After being tried out on several roads, she was sold to the Erie in 1912, becoming No. 2509, the only engine in Class K-#. Diameter of driving wheels 79 inches, weight on drivers 172,500 pounds, boiler pressure 185 pounds per square inch, tractive power 40,600 pounds, total weight of engine and tender loaded 430,500 pounds, coupled length 77 feet $\frac{7}{8}$ inch. Equipped with Schmidt superheater and Walschaert valve gear. Grate area 59.75 square feet.

From Sept. '42 to Oct. '44 Erie leased her to Atlantic Coast Line to haul the *South Wind* and a local. Back home, she ran on the Buffalo Division but finally became so costly to maintain that the Erie sold her for scrap in March '50.

6 Why do you refer to the now-abandoned Monson Railroad in Maine as "two by six?"

Two-foot gage, six miles long.

7 (a) Does your company sell copies of photos that appear in *Railroad Magazine*? (b) Sometimes you use pictures credited to Rail Photo Service. What is this service?

(a) No. (b) It's a long-established mail-order business founded and operated by a locomotive engineer, H. W. Pontin, 93 Massachusetts Avenue, Boston 15, Mass. It sells several sizes of still and action shots of steam and diesel locos with or without trains, mostly in U. S. or Canada, mostly with scenic backgrounds. The thousands of available subjects were made by Pontin himself and a staff of experienced cameramen traveling far and wide.

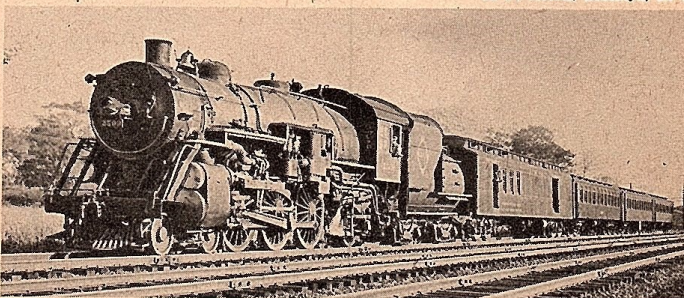
8 Do the British Railways have any AC electric locomotives?

Yes. Britain's first and only such engine, No. E1000, made her maiden run, with a passenger train, last Nov. 28 over the first portion of the London Midland Region main line to be electrified, $9\frac{1}{2}$ miles between Wilmslow and Mauldeth Road. No. E1000 is being used for the training of engineers and the testing of equipment until the 31 miles between Crewe and Manchester are fully electrified.

9 How did the Nickel Plate get its name?

In 1881 the finishing process of nickel

R. P. Morris, Brooklyn, N. Y.



"Big Liz," Erie 2509, shown at Ramsey, N. J., in 1936, was Alco's 50,000th loco.

plating was just coming into general use. So when the New York, Chicago & St. Louis chose to route its newly-built line through Bellevue, Ohio, instead of Norwalk, E. L. Young of the *Norwalk Chronicle* editorialized that it made no difference since it was only a "NYCL-plated railroad" anyway. This topical pun on the line's initials (minus the S) got so much publicity that the management adopted the nickname.

10 When and where and for which road was the last steam locomotive built in the U. S.?

In 1953 by the Norwalk & Western at their Roanoke, Va., shops.

11 Is it true that one machine unloads thousands of crossties a day?

Yes, with a four-man crew. Developed for the Santa Fe by Fairmount Railway Motors, Inc., this new hydraulic machine operates on rails and is placed atop specially-designed cars, from which it loads 6,000 ties a day at the road's tie-treating plant in Albuquerque, N. M., and later unloads them where needed by mechanized section gangs at work on main-line tracks.

Previously, ties were loaded and unloaded by hand, individually. A small gang working hard unloading about 1,000 per day.

12 Who is the oldest living hogger?

We don't know. Possibly John V. Duggan, retired, Denver, Colo., who has top seniority in the Brotherhood of Locomotive Firemen & Enginemen, dating back to Aug. 13, 1882.

13 What is the top speed record of (a) steam, (b) electric, and (c) diesel locomotives?

(a) Unofficially, 127.1 mph achieved by a Pennsy Atlantic type, No. 7002, in 1905. Officially, 126 mph made by the British Railways' *Mallard*, No. 60022, a Pacific type, in 1938.

(b) World's top speed for electrics (or any locomotive), 27 mph, was scored by the French National Railroads' locomotive BB 9004, in 1954. The French train *Mistral*, electrically-powered, has the world's fastest long-distance schedule, averaging 79.4 mph for the entire run between Paris and Lyons, 317.5 miles in 240 minutes.

(c) Although Rudolf Diesel's baby has lower maintenance cost than steam or electric engines, its top speed record lags far behind. There is no record of any stunt-like high-speed run with a diesel. As for long distance, no diesel has bettered the mark of 1,015 miles in 785 minutes, from Chicago to Denver, set in 1934 by the Burlington's *Pioneer Zephyr*.

The fastest scheduled start-to-stop speed recorded last year by any diesel-powered train in America, according to Donald Steffee (*Trains* magazine), was 81.8 mph made by the Illinois Central's *City of New Orleans* from Effingham to Centralia, Ill., 53.2 miles in 39 minutes.

14 What is the difference between a standard fare and a differential fare?

Standard fare is the published rate, whether local or through. Differential fare is the rate, as for freight, where bridge tolls, etc., are added.

15 I have a book called *Catechism of the Locomotive, Revised 1890 Edition*, by M. N. Forney. Were there later issues?

The last one, revised by George L. Fowler, was published in 1911 as the 1912 edition.

16 Which was the first streamlined train?

The Windsplitter, designed by F. U. Adams and built at the Baltimore & Ohio's Mount Clare shops.

On its test runs in 1900, the 6-car train was pulled by non-streamlined engines, in spite of which it appeared to prove Adams' contention that reducing wind resistance would increase speed and cut operating costs. But the demonstrations were not impressive enough to convince the industry, and after the tests the Windsplitter was dismantled.

17 Do you have the words of an old poem, "Call In the Flag and Go On?"

Yes, here it is. Maybe some reader can tell us who wrote it.

"We may stick on the grade," said Old Hoghead Slade,
"For the rails are as slippery as hell;
But we've plenty of sand, and the steam is just grand,
So we'll fare in the end pretty well.
We will send back a flag if the gal chews the rag,
And the tallowpot's tucker is gone,
Then we'll stir up the steam and click to our team
And we'll call in the flag and go on!"

Oft I think of Old Slade when I'm on the up-grade
And my steam isn't working just right,
When I think, "What's the use?" and make every excuse
For giving up hope in the fight.
Then I'll "send back a flag," while my spirits that lag
Are rallied till weakness is gone,
Crying, "Never say dead," but just plug on ahead,
And then "Call in the flag and go on!"

18 What is a "passed fireman"?

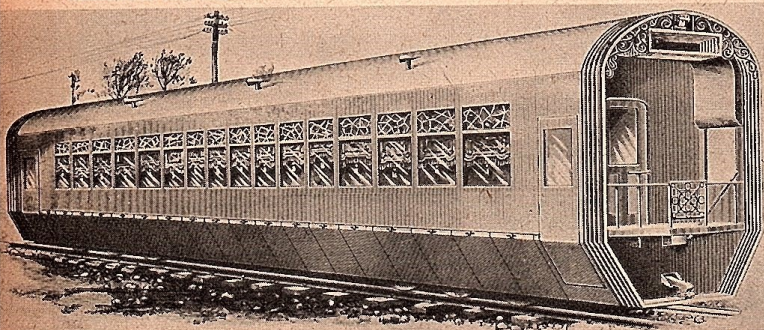
British term for locomotive fireman who has been promoted to engineer but is still working as fireman.

19 (a) What is a cross-compound locomotive? (b) How does it differ from a compound?

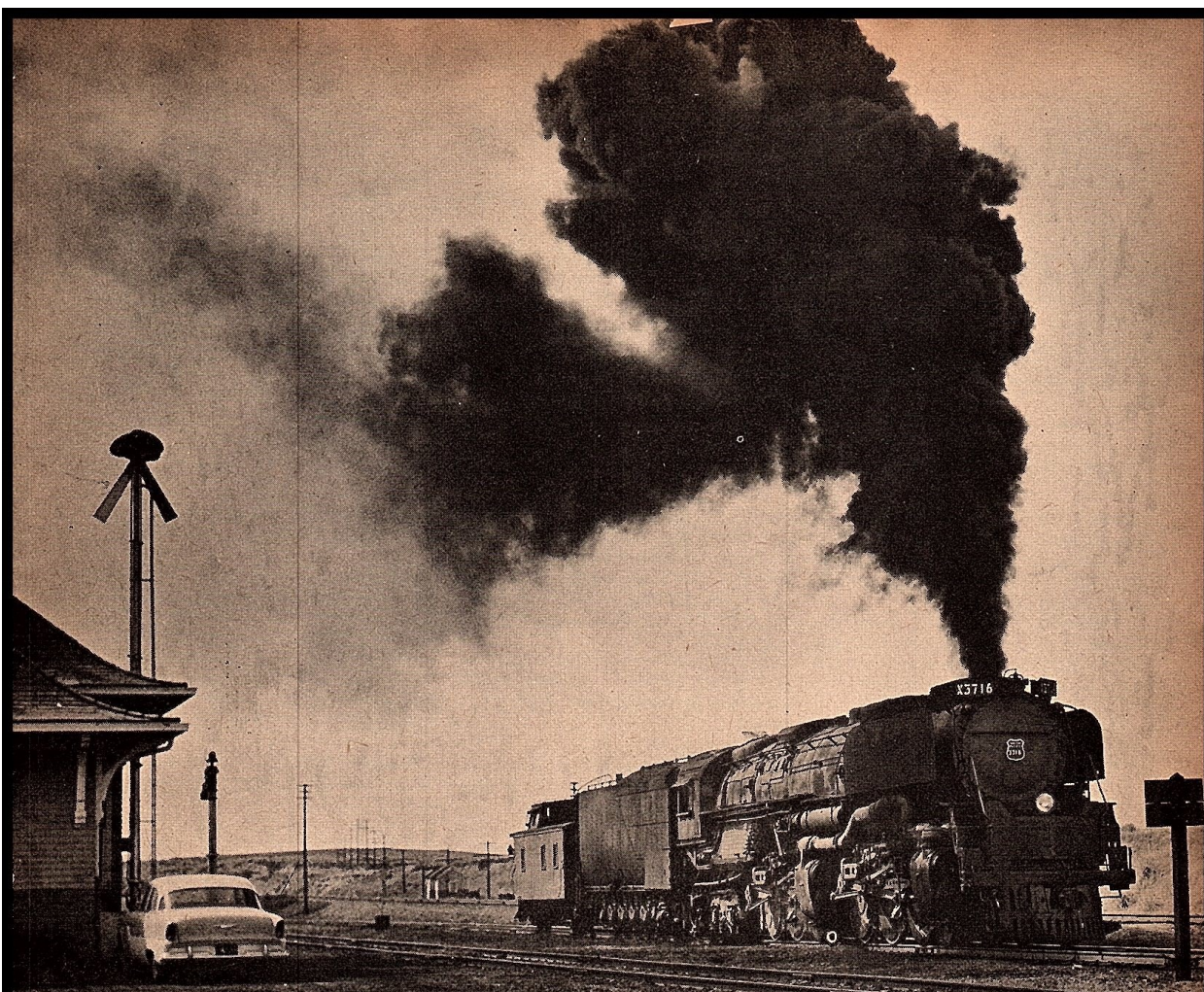
(a) The cross-compound is a two-cylinder locomotive. Steam is crossed from the high-pressure cylinder on one side of the engine to the low-pressure cylinder on the opposite side. (b) A compound, generally speaking, could be a three- or four-cylinder engine using any of the compound systems brought out by such design engineers as Anatole Mallet, John Player, or Samuel Vauclain.

Compounds were in three classes: plain, automatic, and convertible. M. M.

Baltimore & Ohio Magazine



This Adams vestibuled car was part of consist of world's first streamlined train.



A "flying switch" was made by Union Pacific's 3716 at Wahsatch, Utah, on Oct. 18, 1956, to couple onto the train she had helped all the way from Ogden. Alco built this mighty 4-6-6-4 in 1944. Incidentally, no two smoke plumes are exactly alike.

Henry R. Griffiths, Jr., 821 Houston, Boise, Idaho

Kirkman's *The Compound Locomotive*, 1899, gives details.

20 What do railroad officials think of the Interstate Commerce Commission?

Clair M. Roddewig, president of the Association of Western Railways, spoke for the "brass collars" in a speech the other day assailing the ICC for its failure to accord the railroads more rate-making freedom. If the railroad industry is forced to the wall, he said, "the responsibility can be laid at the doorstep of that building at Twelfth and Constitution Avenue" (the Commission's Washington address).

He said government regulation of the

railroads has been a "complete failure." The nation's transportation bill, he added, "is far more than it would be" if the government permitted freer play of competitive forces in transportation service.

21 Approximately how many babies per year are born on North American railroad trains?

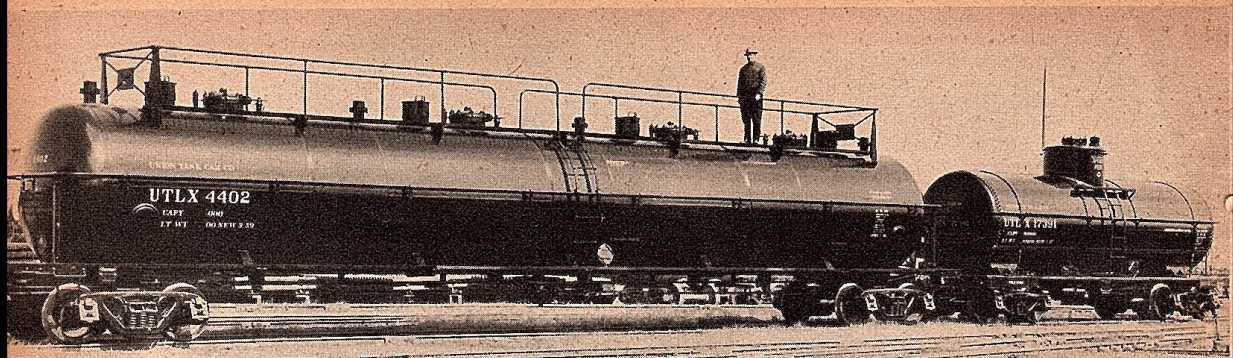
We don't know. Freeman Hubbard devoted a whole chapter to the subject in his book *Railroad Avenue*, now out of print, but gave no statistics. R. T. Sahni, superintendent of the Nagpur Division of India's 5,634-mile Central Railway, says that one reason why trains on his division are delayed is that about 180 babies a year are born on them.

22 To what extent are U.S. railroads dieselized?

The more than 27,800 diesel-electric locomotive units owned by Class I railroads handle about 95 per cent of all U.S. rail traffic.

23 I am a Soo Line conductor. When I retire, could I get a larger income under the Railroad Retirement Act or the Social Security Act?

Unless laws are changed, you could eventually get more than twice as much under the Railroad Retirement Act. Under the Social Security Act, recently amended, the maximum age annuity now is only \$116 per month; 20 years



"Jumbo hot dog," the world's biggest tank car, stands beside a little sister at Union Tank Car plant, Whiting, Ind., which built her for South Penn Oil Company, Oil City, Pa. She is 67½ feet long, 14 feet 8 inches high, and has a capacity of 21,800 gallons, twice the load limit of most present-day tankers. South Penn will use four jumbos to haul lubricating oil.

hence, \$125. Mr. Thomas M. Healey of the Railroad Retirement Board states: "Our maximum today is in excess of \$185 per month and by Jan. 1, 1879, will be \$274 per month."

"Moreover, the Railroad Retirement System provides for occupational disability and residual payments to survivors. Social Security does neither."

24 (a) Does the Chesapeake & Ohio own any small railroad companies? (b) Is the C&O fully dieselized?

(a) Yes, the Cincinnati Inter-Terminal, the Covington & Cincinnati Elevated RR. & Transfer & Bridge Co., the Lake Erie & Detroit River, the Rockcastle, and the Washington & Old Dominion. (b) No, they have 1,072 diesel locomotives but are still operating three fireless steam switchers.

25 What is "traveling by alphabet?"

Most stations on Canadian National's main lines west of Winnipeg were named in alphabetical order to help officials locate a station quickly on the sparsely settled prairies half a century ago. They run from Arona, Man., to Zeneta, Sask., then start all over again at Atwater, Sask., to Xenia, Sask.

26 Give me a brief history of the Western & Atlantic.

The W&A, the Louisville & Nashville's newest subdivision, runs from Atlanta's famous Zero Milepost to East End Avenue in Chattanooga, Tenn., 134 miles away.

The tracks of the W&A today travel over almost the same route laid out by the Western & Atlantic Railroad surveying crew in 1837. Over this territory in 1861-1865 moved the fortunes of the Blue and the Gray, and many a

point along the line is hallowed ground.

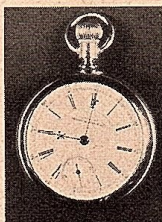
Some 87 miles of its track, from Kennesaw to a point near Graysville, is probably the most famous section of any railroad in the country. That was the scene in 1862 of the Andrews railroad raid.

In addition to main-line track, the jurisdiction embraces the big freight yard at Hills Park and the Atlanta terminals.

27 How many (a) locomotives and (b) vice presidents does the Pennsy have?

(a) 1,815 owned, 321 leased, according to 1958 Annual Report. Owned locos include 22 steamers (21 freight, one switcher). The only Pennsy steamer now operating is No. 5244, leased to 19-mile Union Transportation Co. She runs out of New Egypt, N. J., every Monday about 9 a.m., occasionally Tuesdays also. (b) Ten.

28 Where is Casey Jones' watch?



If you mean the one he carried on his "farewell trip to the Promised Land" and which was found in his pocket after the wreck at Vaughn, Miss., 59 years ago, you can see it any day at the Casey Jones Home and Railroad Museum, Jackson, Tenn. It has 15 jewels and a gold case, was manufactured by American Waltham Watch Co.

29 How many railroads serve Chicago?

Including industrial switching lines,

34. More details can be found in the *Official Guide*.

30 Several years ago there were only two Hall Interlocking machines remaining in North America. One was in the Broadway-Myrtle tower on the New York City Transit System and the other in Canada. The former was replaced with a GRS machine. Is the Canadian installation still in service?

Canadian National says that it no longer has Hall Interlocking machines in use.

31 I heard of a railroad called the Grasse River, Conifer, N. Y., which is run by two men. Are there any other two-man lines?

Yes, the Strasburg, Strasburg, Pa., the Milstead, La Grange, Ga., the State University, State University, N. C., the Craig Mountain, Winchester, Idaho, the Union of Oregon, La Grande, Ore., and the Natchez, Urania & Ruston, Urania, La.

32 In locomotive parlance, what is a cow and calf with a slug added?

Cow and calf is a two-unit combine, both units powered but only one equipped with controls. The slug has no power but is equipped with traction motors which draw their power from the two live units.

33 Which is Ohio's oldest railroad?

The Little Miami, incorporated in 1834. It has 200 miles of track between Cincinnati and Columbus, Ohio, and Richmond, Ind. The Pennsylvania Railroad, majority stockholder, operates it.

34 How do hot box detectors pin-

RAILROAD

point trouble in passing trains?

On a moving tape in the signal tower ahead. The electronic eyes, attached near the outer side of both rails, automatically register the temperature of each journal box as it passes, with a short pip for normal temperature and a long one for excessive heat.

Running Extra

When you answer a question requested in *Information Booth* or *Running Extra*, be sure to mention the item number and date of issue.

ALTHOUGH we state in every issue, "Top priority is given to subjects that seem to be of wide general interest . . . No replies will be sent by mail," we often get letters requesting personal mail service. Some fans submit whole lists of involved technical queries in one letter.

We enjoy digging up railroad facts. We also like to oblige people. But much as we would like to, we cannot engage in correspondence with individual readers nor put in enough research time to do justice to long lists of tough questions.

LETTERS like this one always cheer us up:

"In my transportation library I have *Railroad Magazine* bound into volumes from way back, and I like to browse in these now rather yellowed books. What a lot of interesting material they contain, data diligently gathered in the course of years and from many sources. It makes very interesting reading.

"I am often amazed at the information which is asked of you, and while I am pretty well informed on the railroads of Switzerland, you have to know practically the railroads of the whole world." Thank you, Fred Eidenbenz, 10 W. 49th St., New York, N.Y.

INFORMATION and pix on Iowa blizzard that tied up railroads in Feb. '36 are wanted by Charles Bourgart, Box 310, Dodge City, Iowa.

EARLE HANFORD asked in June issue for information on a brass railroad lantern made by Dietz for the B&S. Also lantern made by Armspear Mfg. Co. for the Pennsy. Consult *Thomas Register of American Manufacturers* (found in reference department of any good public library) for address and write to the manufacturer direct, suggests Hugh F. Stephens, 220 Mount

OCTOBER, 1959

Vernon Pl., Newark, New Jersey.

ANSWERING item 1, August issue, the Association of American Railroads comments:

"Detailed studies by the railroads of ground-level operating experience show that more than \$500 million a year in unnecessary employment costs result from antiquated rules. Such waste is concentrated in rules requiring the staffing of useless fireman, brakeman, and other positions; in the 40-year-old mileage-day pay system for train crews; and in tight jurisdictional work divisions that require employment of two or three men where one could do, or double and triple pay for single-time work . . .

"An authoritative Royal Commission in Canada, after lengthy study and testimony concerning the diesel fireman's position, reported in December, 1957, that 'firemen are not required on diesel locomotives,' and concluded: 'Their functions have either totally disappeared, as in the case of the production of power, mechanical assistance, and inspection, or are a mere duplication of what is discharged by another or others, as in the case of the lookout functions performed by the head-end trainman and the engineman.'"

The A.A.R. points out that approxi-

mately 850,000 U.S. rail employees today are handling 4.4 times as many ton-miles of freight traffic as 60 years ago but that their annual pay has increased 10 times, and says:

"Thus, labor productivity, in terms of traffic units handled per dollar of employe compensation, has been cut almost in half . . .

"Showing further how labor's wage gains have outrun worker output are these statistics: Since 1922, traffic units handled per hour paid for have increased by 220 percent, yet wages per hour paid have risen far more, 304 percent."

The foregoing is, in part, management's side of the controversy. Further details may be found in *Featherbedding: Facts vs. Fancy*, a copy of which will be mailed free, on request, by the Association of American Railroads, Public Relations Dept., Transportation Bldg., Washington 6, D.C.

This is a redhot issue. Readers should study the arguments on both sides and judge for themselves. Our August number carried a statement by H. E. Gilbert, International President, Brotherhood of Locomotive Firemen & Enginemen.

You can get the employees' viewpoint regularly in *Labor*, a national illustrated weekly newspaper owned and

Boston & Maine Railroad



Boston & Maine hotbox detector at Ayer, Mass. Devices for measuring heat of passing journal boxes are shown at lower left. The man is John Killelea, signal helper.

published on a non-profit basis by 17 standard rail labor unions, 401 Third St., N.W., Washington, D.C. Subscription price, \$2 a year.

INCIDENTALLY, a cartoon in the *Brotherhood of Maintenance of Way Employees Journal* shows a railroad company board meeting being addressed by the chairman as follows: "And I am happy to report that with the elimination of 2 more jobs in the Maintenance of Way Department, we'll be able to create another Vice President."

BRIEF history of the East Broad Top is wanted by Tom O'Neil, 715 Verner

Avenue, McKeesport, Pennsylvania.

PAUL ORLOW, 269 Renwood Ave., Kenmore, N.Y., wants info. on any steam operation in Ohio and Pennsylvania, industrial or common carrier, also stored engines.

SKEPTICISM marks the reaction of William J. Parry, R.R. 1, Belle River, Ont., Canada, to claims made by the questioner in Item 4, June issue. Bill is a retired hogger. He writes:

"I do not think a locomotive could

burn so much as 25 to 27 tons of coal in 3½ hours, nor that any man could heave 70 or 80 scoopsful into a firebox every 8½ minutes on such a run.

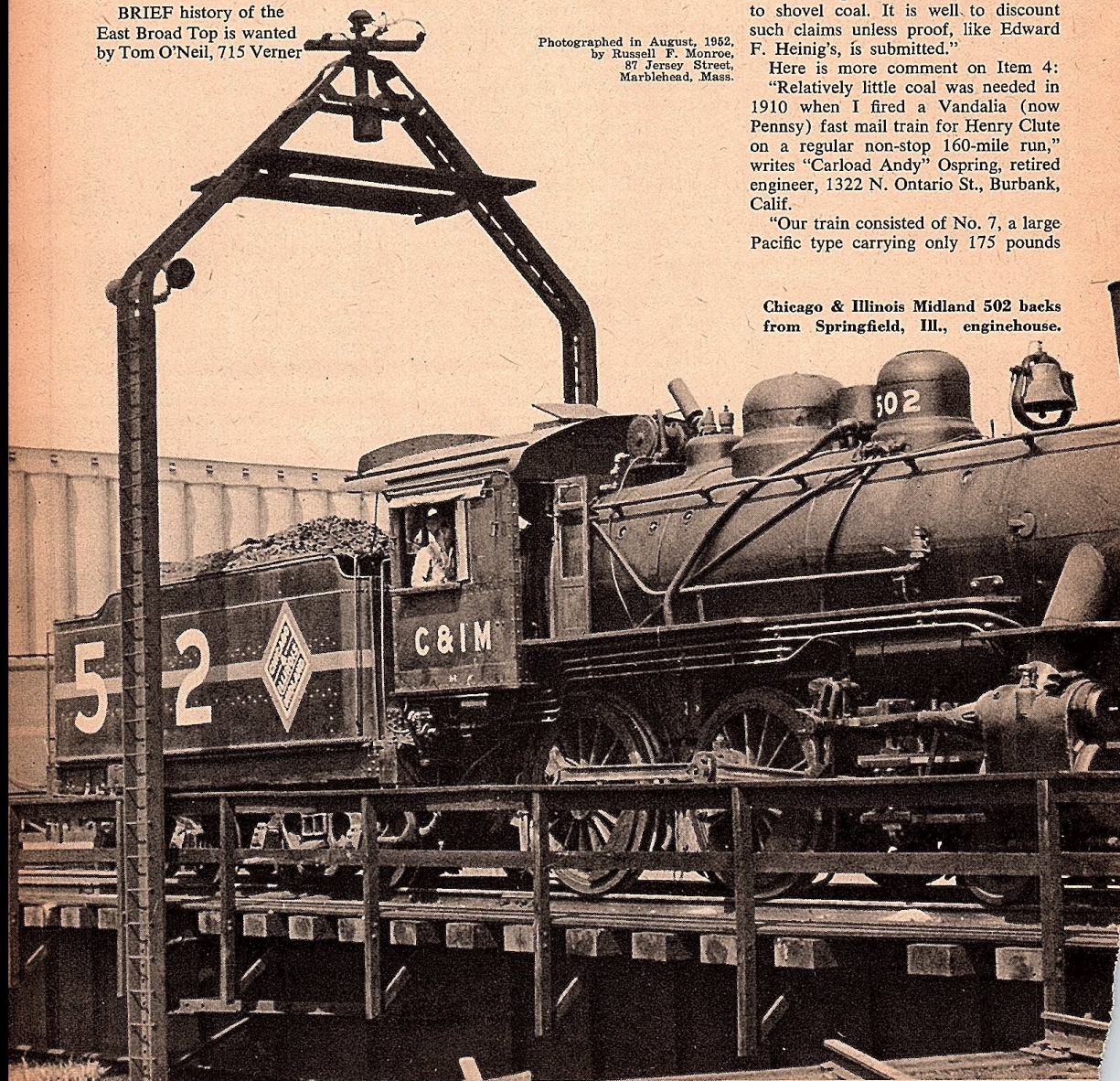
"When I was working as a Canadian National engineer, I hauled 83 loaded boxcars at 60 miles an hour with a Northern-type loco, but I doubt that a speed of 60 to 80 miles an hour could be attained with 100 or more loaded boxcars. My engine was being worked to full capacity. She would not have made 60 mph with 100 cars. Railroaders are inclined to go off the deep end in discussing fast runs and their ability to shovel coal. It is well to discount such claims unless proof, like Edward F. Heinig's, is submitted."

Here is more comment on Item 4: "Relatively little coal was needed in 1910 when I fired a Vandalia (now Pennsy) fast mail train for Henry Clute on a regular non-stop 160-mile run," writes "Carload Andy" Ospring, retired engineer, 1322 N. Ontario St., Burbank, Calif.

"Our train consisted of No. 7, a large Pacific type carrying only 175 pounds

Photographed in August, 1952,
by Russell F. Monroe,
87 Jersey Street,
Marblehead, Mass.

Chicago & Illinois Midland 502 backs
from Springfield, Ill., enginehouse.



of steam, and ten steel cars, and I dared not let the needle drop below 175. There wasn't much chance to hit the seatbox on that run, I had to toss about four shovelful of coal at a time into the firebox with a No. 5 scoop. Two of them always went into back corners. I had learned that the less coal you shoveled at a time, the more steam you would raise, so I shoveled often.

"On this run with Engineer Clute I rarely used more than three tons in three hours from Terre Haute to East St. Louis, many times only 2½ tons. But with some engineers on the same engine, same train, it would go up to 5 or 6 tons for the same distance, which was a lot of shoveling for a train doing over 60 miles per hour."

And the subject isn't exhausted yet. "A Southern Pacific ex-fireman and engineer who had access to a mechanical brain ran the figures off and got the startling information that in order to put 27 tons in a firebox in 3½ hours the coal heaver (I don't say fireman advisedly) would have to average one 20-pound scoop every 4.66 seconds. His conclusion was that no man could do it."

So writes Charles H. Warrington,

602 W. 5th Ave. N., Estherville, Iowa. He continues:

"Now please permit me to express my own opinion, based on my experiences as a fireman on two railroads. I would hesitate to say it was not done, or could not be done, because I can visualize an accumulation of abnormal conditions under which such a performance might in theory be possible.

"(1) It would have to be in the era of the 'tea kettles,' before the invention of the Elesco water pump and the Worthington feed water heater, to say nothing of the better types of injector.

"(2) The coal would have to be very soft, porous type (a coal that burns as fast as it hits the grates) such as the lignite recently used by the Union Pacific, Burlington and other western roads in their stokered engines.

"(3) The engineer would have to 'beat' her hard continuously for 3½ hours even to burn that much lignite—probably on a grade with tonnage. (My aching back!)

"(4) The fireman could only be the Paul Bunyan of railroading. It's difficult to conceive a man shoveling that much coal from one pile to another while standing on the ground—much less putting it in through a small trap like a firedoor.

"I don't know of any period in history when 'tea kettles' plus lignite plus engines with a large enough grate area to burn that much coal in such a short time coincided. But it might just be possible that they did. Let's give the guy the benefit of the doubt."

ONLY ON very rare occasions does a girl write to this department. One such person is Miss Carol Askeland (no address), whose question appears in this month's *Information Booth*. Will Carol please tell us how she happened to become interested in railroading, and the extent of that interest?

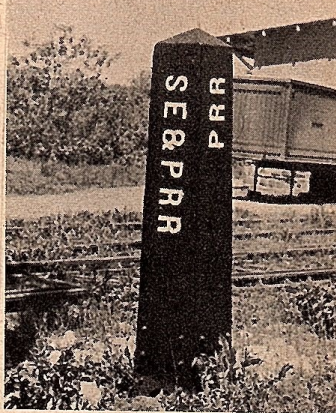
"ON PAGE 41, April issue, Lowell Williams wanted a list of mixed trains still left in North America. Tell him to get a recent issue of the *Official Guide*, as hundreds of such trains are still running. Too long to list, unless he wants the job!

"On Page 37, Item 20: the Marianna & Blountstown 4-6-0 No. 444 is at Blountstown, Fla., the road's headquarters. The M&B does not go to Port St. Joe, which is served by the Apalachicola Northern. However, add to Item 20's list St. Joe Lumber & Export Co. No. 11, 2-6-2, with balloon stack, on display outside the Municipal Museum. She was Baldwin No. 45365, built at Philadelphia in 1917," says S. D. Crews, P.O. Box 7074, Jacksonville, Fla.

"RECENTLY, while taking photos in a freight yard on the Long Island Rail Road, I came across a bright orange boxcar bearing the word BOOKIE in large black letters. I thought I knew quite a bit about railroads, but this just doesn't make sense," says Russell Kurth, 160 S. Babylon Tpk., Merrick, N. Y.

The LIRR is puzzled too. They comment: "Lack of information on the car makes it pretty nearly impossible to trace. We even looked through all listings of refrigerator cars, but none of the names of owners of orange-painted cars even comes close.

Clinton T. Andrews



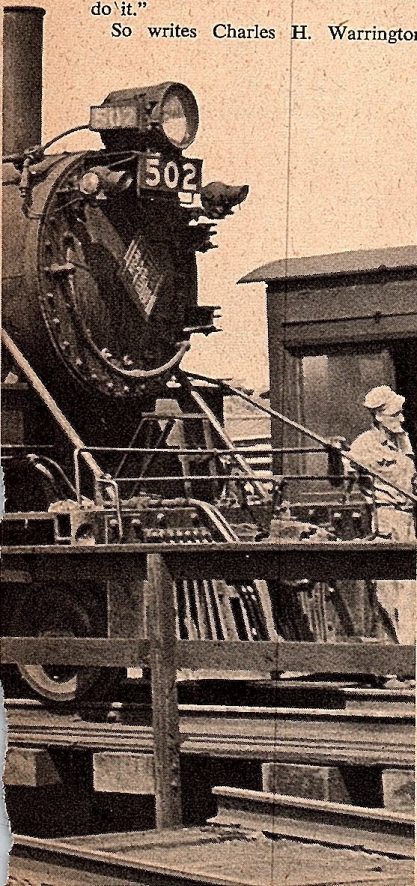
Pennsy-SE&P marker at approach to Delaware River bridge, Phillipsburg, N. J. Bridge was built 1907; middle is 47 ft. from rail top to water level.

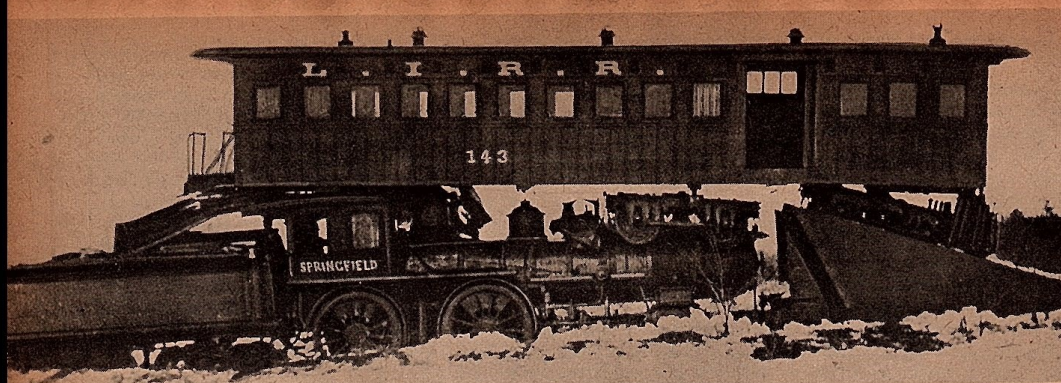
"Although we're looking for every possible way to increase our revenues, we haven't yet taken to setting up bookie parlors in boxcars."

INSPIRED by question 24 on brass switch keys in the April issue, "Carload Andy" Ospring has this to say:

In the 1870's on the St. Louis, Vandalia, & Terre Haute, all switch keys were made of copper. It was easy to cast, looked better, had no burrs, and didn't wear out your pocket so quick. Most all switch keys on all roads at that time were copper cast, then polished on a buffing wheel. Later in the '90's the harder, longer-wearing brass keys began to come into general use. The Pennsylvania and Vandalia keys were different up to about 1920. The Pennsy used hard brass (with more zinc in the mixture) even in the early days. Steel was never used because it broke easily and had too many burrs.

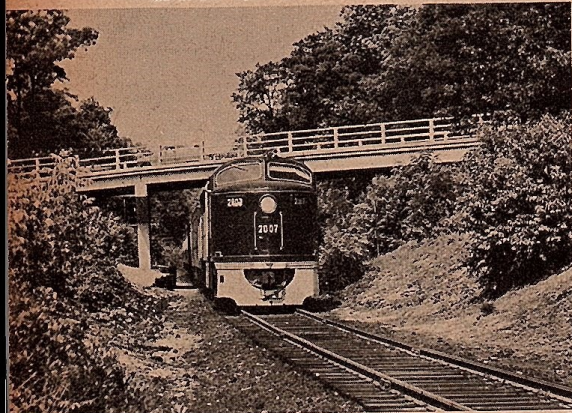
Each key was numbered and they kept track of who had which number. It cost \$5 to lose a key. They were seldom lost.





Back in 1875, long before LIRR won fame as the world's largest commuter road, a Mr. Conlin shot this photograph at Waverly, N. Y., on the main line. Who can supply details about the freak wreck or the engine named *Springfield*?

Savas Stavropoulos, 85-46 Chevy Chase St., Jamaica, N. Y.



No. 2007 west of Smithtown. (Below) Four of the 77 diesels which now constitute the Long Island's locomotive roster.

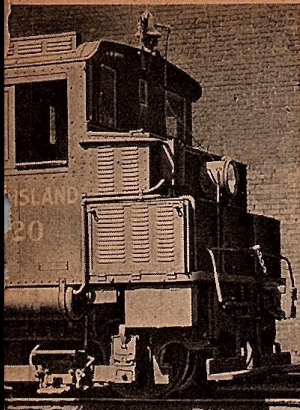
We Salute the

Long Island Rail Road

on Its 125th Anniversary



H. O. Bailey



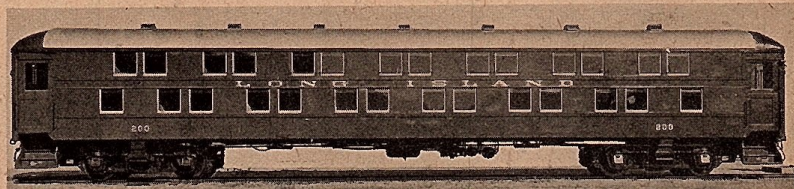
Yard goats numbered
320 and 403.



George Bosch



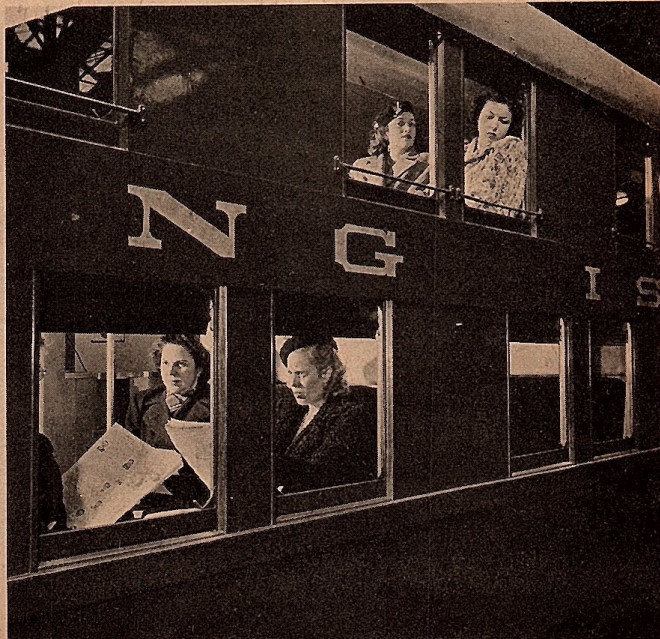
No. 27, Juniata-built 10-wheeler, with 12 passenger cars near Mill Creek (July 26, 1940).
Norman E. Kohl

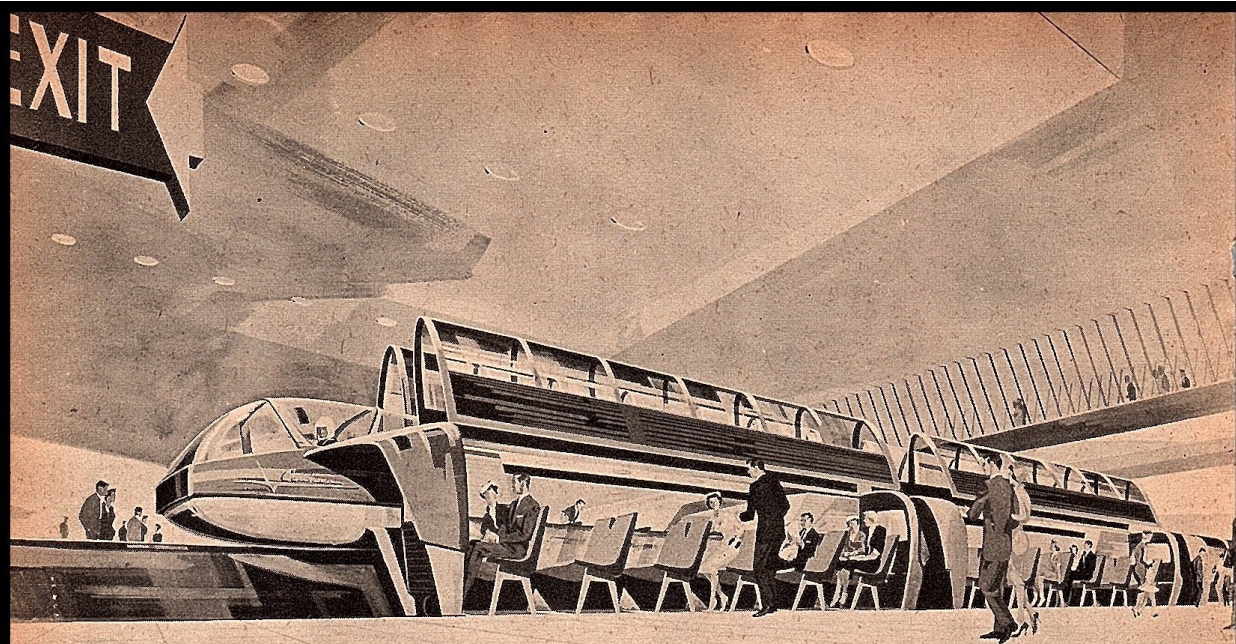


John A. Miller

The Long Island, one of the very few roads using double-deck passenger cars, has 63 of them.

Long Island Rail Road





Easy entry into monorail cars designed by Lockheed Aircraft Corp. for Seattle's *Century 21 Exposition* is seen in artist's conception of train at downtown terminal. Entire side of each car slides up automatically; passengers board at any point.

Steve Maguire's TRANSIT TOPICS

MONORAIL for Los Angeles? Maybe. The Metropolitan Transit Authority of L.A. has finally come out of a long period of silence, for which it was sharply criticized, announcing that within a year it will begin to select rail routes for four rapid-transit corridors totaling about 85 miles. These corridors will lead to downtown L.A. from Reseda, Santa Monica, Long Beach, and West Covina, but whether the proposed new service will be elevated, surface, subway, or monorail has not yet been decided.



Steve Maguire

All equipment will be new and of uniform design and type to be chosen later on. Routes would go out of Civic Center to West Covina for 21 miles, mostly in the center of the freeway

open strip; to Long Beach for 21 miles, mostly using the present railway line; to Santa Monica, 16 miles away, and to Reseda via Hollywood to merge with the Santa Monica line. The first of several readers to send us this good news was Edward Hamm, Jr., 152 S. Berendo St., Los Angeles.

VENEZUELA'S capital, Caracas, will soon have a rapid-transit system, either subway or monorail, according to Governor F. C. Batalla of the Federal District. A study of the two alternatives is being made by a corps of about 50 engineers headed by Col. Sidney H. Bingham, former chairman of the Board of Transportation and manager of the Transit Authority of New York City.

"A modern system of mass transportation is most necessary," Governor Batalla says.

He is also planning to decentralize industries in Venezuela and build many

fine avenues and parks to replace narrow streets. The population of Caracas, now more than 1,100,000, has almost doubled since 1950. Sentiment favors a monorail system, which, it is estimated, would cost about \$2 million per mile as compared with subways at \$13 to \$16 million per mile. Either a subway or a monorail would cover the city length in about 20 minutes. At present it takes almost two hours to go through Caracas.

NEWEST monorail operation was opened in June at Disneyland in Anaheim, Calif., with a mile-long system built by Alweg Company of Germany in cooperation with engineers working for Walter Disney, a long-time railfan.

The new attraction is being studied by civic leaders from urban areas who have received many suggestions for handling their traffic problems but who find monorail hard to envisage without seeing it in operation. For up to the present, the old monorail line at Wuppertal, Germany, is the only commercially practical one now in operation, although experiments have been made with mile-line lines in Tokyo, Japan, and Dallas, Texas.

Disneyland monorail, however, is not operated by steel wheels on steel rails.

RAILROAD

The cars run with rubber-tired wheels on a concrete runway 35 feet above ground. Due to the rubber tires and operation by electricity, they are practically soundless. Top speed for regular operation is about 35 miles an hour, although the cars are geared to run far above that speed.

DOWN in New Orleans, a tentative franchise for a monorail system was granted last year when engineers found that a 15-mile line would be feasible. But we have no late word on this plan.

There have been suggestions for the erection of a mile-long monorail line in Los Angeles as a test track. It would be built by Norail, a division of Northrop Corporation, and would cost under two million dollars apart from the value of the land.

The area between Long Beach and L.A., now served by the LAMTA interurban line, is proposed for monorail service.

According to Robert Swain of *Transit Leadership*, such a plan would far exceed the cost of rehabilitating the existing rail line. The Norail system at \$1½ million a mile would cost \$3 million to build from L.A. to Long Beach, while the rail line could be rehabilitated for about \$4½ million plus \$2 million for 18 new railcars, \$1 million for road-bed repairs, and \$1½ million for new automatic crossing gates, all of which would cut travel time to 30 minutes.

At Seattle, Wash., plans are in progress for a one-mile monorail, electrically operated, costing \$5 million that would run from Fifth Avenue and Pine Street in the downtown area to the Seattle Century 21 Exposition to be opened in 1960.

Cars will be mounted atop a center rail across which they would be slung. A drastic innovation will be slides that go up to the roof so passengers could load and unload rapidly.

This system will be operated by the municipal Seattle Transit Commission, which has already named Lockheed Aircraft Corp. to build the line and complete it for operation by about Nov. 1, 1960. Says W. W. Scruby, chairman of the Exposition: "The system is a break-through which could well bring passengers back to urban mass transportation."

RESPONDING to our request for information on the Pittsburgh Railways, largest trolley system now operating in the U.S., James Cerney, Jack Murphy,



Pittsburgh Railways' first PCC car, originally numbered 100, now M11, was photographed at Drake Loop near Castle Shannon, Pa., on fantrip July 22, 1956. Calvin E. Senseny, 443 Wayne Ave., Chambersburg, Pa.

and Edward Ridolph send us news of a large-scale conversion to busses of trolley routes using the Point Bridge to reach the west end of Pittsburgh.

Redeveloping of the Point, including a new bridge, brought about an agreement between the company and the city whereby six streetcar routes would be "bussed" so that new rail and overhead and necessary ramps for trolleys need not be built on the bridge. The trolley company agreed to replace the cars with buses and eliminate its wires. For this it would be relieved of being required to remove 41 miles of rail from the streets and would be paid \$300,000 in cash.

The abandonment of six routes has ended rail operation in Crafton, Ingram, McKees Rocks, Heidelberg, Scott and Stoew townships. But Pittsburgh now has 47 railway lines left, including inclines. Five are suburban or interurban type service.

PACIFIC ELECTRIC. Readers who enjoyed Harry Bedwell's stories in our August and current issues will be interested to learn that a very large assortment of PE slides (color, 35c each; black-and-white, 25c) is obtainable from Thirty-five Slides, Box 279, Green Mountain Falls, Colo. Free list available. (Why the outfit calls itself "35 Slides" we don't know; its total stock, PE and others, runs into thousands.)

Two Stark Electric interurban wind-splitter that met in a head-on crash in 1918, as related in August *Transit Topics*, were Nos. 19 and 20, not 18 and 19 as we said.

LATEST reports of the last two Canadian interurban lines, both of which quit passenger service in March, tell us that the Quebec interurban cars were stored in the Canadian National Limolou shops, with No. 401 and trailer 105 being sent to the Canadian Railroad Historical Society. There is some chance that the Branford Museum will get one of the steel 450 types.

According to Jean LeClerc, 24 Plante, Levis, P.Q., the St. Paul terminal is down, tracks are gone, the turntable is filled in, and ground is being made ready for construction of a new post office. Diesels have taken over all freight as well as the CNR Murray Bay passenger train service.

All passenger interurbans of the Niagara, St. Catharines & Toronto line were shipped to the London, Ont., scrap yard of the CNR the day after final operation. Freight is still hauled by electric motors, a situation likely to continue for a year or two more.

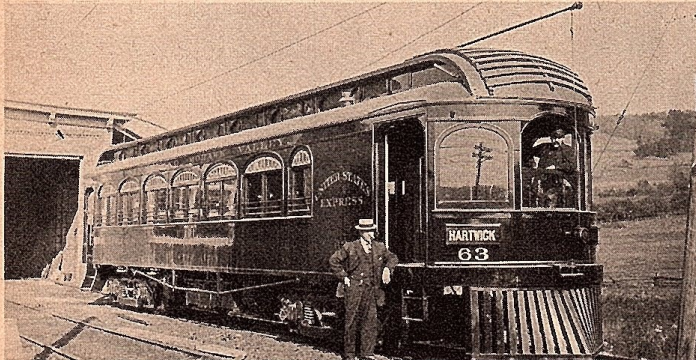
ALSO IN CANADA, the Toronto Transportation Commission may purchase 40 PCC cars from the Philadelphia Transportation Co., reports John F. Bromley, 32 North Drive, Toronto. They are PTC ex-Kansas City cars 2251-2290, identical with the TTC 4753-4779 cars also purchased from KC. If the plan is carried out, TTC could get rid of the last Peter Witts without having to add new parts or tools for an additional type of equipment.

GHOST of the old New York, Westchester & Boston interurban line rose



No. 678 of the Seattle Municipal Railway posed for picture on Route 1 in 1938.

Steve Maguire, 1411 River Rd., Belmar, N. J.



Here's a real oldtimer. No. 63 of the Oneonta & Mohawk Railway, pictured in front of carhouse at Hartwick, N. Y., was built by Cincinnati Car Co. in 1907.

Collection of J. C. Burchard, Box 293, East Haven, Conn.

up after 20 years to aid in building more than a mile of the new limited-access highway near Scarsdale, N. Y. The old right-of-way was found useful. This area is already heavily built-up with homes and apartment houses, with the roadbed the only open land left for a new through highway.

CHICAGO Transit Authority has received the first two new rapid-transit cars on an order for 100 lightweight, all-metal cars which was placed in March, 1958, according to Walter J. McCarter, CTA general manager.

The rest of the 100, bought from St. Louis Car Co. for \$5,150,500, will be delivered at the rate of five per week. By using some parts from its "Green Hornet" streetcars, CTA is saving about \$2 million as compared with the cost of cars built from all new parts.

Fifty of the cars are to be two-units, semi-permanently coupled. The other 50 are to be double-end, single-car units designed for operation either singly or in trains composed in part of two-car units.

Four of the single-unit cars will be fitted with 100-hp. high-speed, high-performance motors and controls and specially designed trucks and gears to determine the type most suitable for

operation in the rights-of-way of multi-lane expressways. Painted silver and maroon with red roofs, they will be easy to identify. The other 96 cars will be painted in CTA's standard green, cream, and orange.

Each of the 100 cars will be equipped with three types of electrically-operated brakes: (1) a dynamic motor brake that, in effect, converts the car's motors into generators and thus provides deceleration; (2) a motor-drive-shaft brake, and (3) a magnetic track brake.

AUSTRALIAN fans have a monthly publication, *Electric Traction*, usually 16 pages with photos and news of all tram lines "down under." Though it sells for \$4 per year, a special price of \$3 is offered to *Railroad Magazine* readers who subscribe before October 1. Checks or money orders should be sent by airmail to the Australian Electric Traction Ass'n, 22 Kitchener St., Carlingbah, New South Wales, Australia.

THAILAND tramways have been covered by J. Wallace Higgins, a New Jersey juicefan now on foreign service in Japan. In a recent trip to Bangkok, the capital, he found a city system of 1900 vintage still running on seven routes with single-trucked open and

closed cars, occasionally hauling trailers.

Most track is along the side of the highway. Trolleys battle traffic, especially at turnouts that bring track even farther into the busy streets.

A shuttle car, seating 10 first-class passengers at one cent each and 14 second class at half fare, may carry a crew of 2 or even 3 men. Our August issue pictured a closed car on this line.

Bangkok also has the only interurban line in Southeast Asia, the Paknam route of the Thailand State Ry. System, running 17 miles between Bangkok and the port of Paknam. As the country's first railroad it was electrified before World War II. No freight is carried. Three 3-car trains of interurban cars built in Japan run 10 round trips daily.

TUCUMAN, in northwestern Argentina, has a street railway system dating back to the early 1900's, reports Arnold I. Reid, Defensa 665, Buenos Aires, Argentina, who visited there recently. He says there are seven car routes, all in loops. Cars are single-ended, always going in the same direction; hence all track is single. A dozen old cars are still running; 20 modern ones were bought second-hand recently from the Buenos Aires system. All are single-truckers.

All carry bow trolleys and run on badly maintained track; yet it matters little, since there is no competitive type of transportation. Originally yellow colors, the newest ones are painted gray and green.

Some readers wonder why Mr. Reid, with a non-Spanish name, resides in Argentina. Here is the explanation. His grandfather, a newspaper man, migrated from Scotland to Chile with his ten children and later settled in Argentina. Arnold's mother's people, also of Scottish extraction, have been living in Argentina for well over 110 years. Arnold works with a British-owned company that makes phonograph records.

"My hobby of taking photos of streetcars and trains," he tells us, "causes the local population to regard me as eccentric."

A RAILFAN project that deserves support involves taking over the Colusa, Calif., city tracks and seven miles of Sacramento Northern interurban track. The Northern California Electric Railway Museum seeks to obtain this and asks fans for whatever financial aid they can afford to give. The track and right-of-way can be bought cheaply

RAILROAD

from the SN that is abandoning it. The City of Colusa has already approved the use of the double-track line in their streets by cars on Saturdays, Sundays, and holidays in the summer season. Thus the museum group is in a position to have a made-to-order trolley system. If the plan succeeds, they would have the most extensive trackage of any fan group but need a power plant. ●

New Publications

ELECTRIC RAILWAYS OF INDIANA (Part 2) covers Indiana Railroad and its subsidiaries, also the Winona, with 180 pages, 460 photos, and six beautiful full-page color plates. Also maps, sketches, timetables, transfers, tickets, and alltime equipment rosters. Published as CERA BULLETIN 102, it is recommended to all persons interested in old mid-western traction lines. Available at \$7.50 a copy from Central Electric Railfans Ass'n. P.O. Box 503, Chicago 90, Ill.

We advise you not to delay in ordering CERA BULLETINS, for they sell out fast. Already No. 101, dated 1957, is out of print. Best way to make sure of getting these annual monographs is to join the CERA, preferably before Nov. 30, so you can buy the next one, dealing with Michigan, at pre-publication price, \$5.

CERA issued a 14-page listing of Japan's 190 tramways and electric railways, including data on mileage, rolling stock, etc. Compiled by Tom Desnoyers, Chas. Greely, and J.J. Wallace Higgins (now in Japan), it is free to CERA members.

THE CABLE CARS OF SAN FRANCISCO, with text and very good photos, by Phil and Mike Palmer, is a refreshing new study of an intriguing old subject. Phil is a professional photographer, his son Mike an experienced writer. Their 46-page publication, 6x9 size, sets a high standard. We enjoyed especially their description of the mechanics of cable-car operation. Copies from Howell-North Books, 1050 Parker St., Berkeley 10, Calif., at \$1 each.

Connecticut Valley Chapter of NRHS has put out two more **TRANSPORTATION BULLETINS**. The Dec. '58 issue covers **SEMI-CONVERTIBLE CARS OF EASTERN MASS. ST. RY.**, with several photos of those 4000-series cars in its 8 pages. Price, 25 cents from Roger Borup, Warehouse Point, Conn. The Jan. '59 issue features **BIRNEY CARS OF THE EASTERN MASS. ST. RY.**, with pix and specifications, 8 pages, same price.

MICHIGAN HISTORY, March '59, a quarterly publication of Michigan Historical Commission, Lewis Beeson, editor, Lansing, Mich., contains 50 pages, with pictures, on **THE ELECTRIC INTER-URBAN RY. IN KALAMAZOO COUNTY**, by A. Rodney Lenderink. A few copies are available at \$1.25 each.

Winter '58 issue of **KANSAS HISTORICAL QUARTERLY** includes a 10-page story of Cottonwood Falls-Strong City streetcar line. Written by Allison Chandler, 228 E. Jewell St., Salina, Kan. (Remember his article, "The Life of Riley," Dec. '58 **RAILROAD MAGAZINE**, in which your **TRANSIT TOPICS** editor collaborated?) Although the **QUARTERLY** is not publicly distributed, Mr. Chandler generously offers to loan a copy of it to any fan, on request.

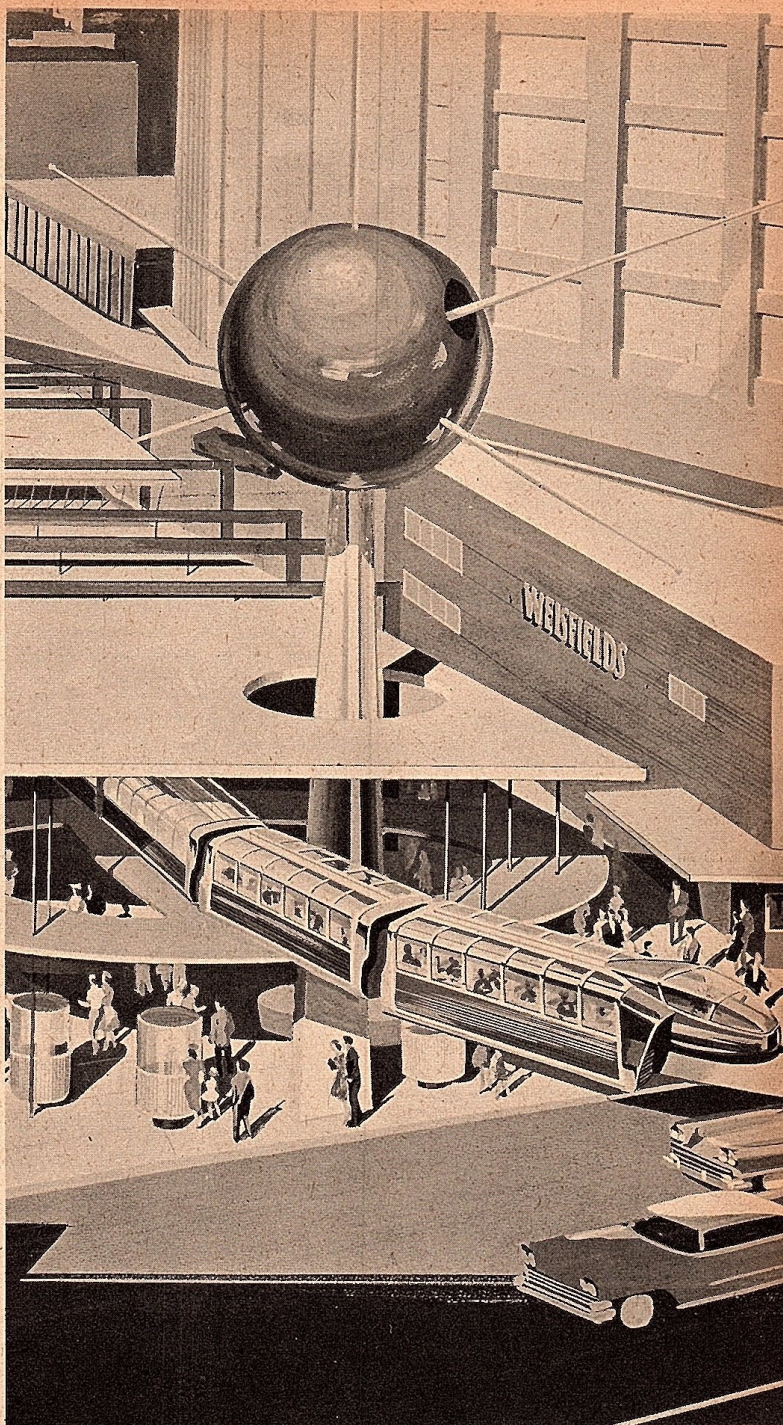
THE LAFAYETTE STREET RY. of Indiana is the subject of **BULLETIN 32**, Electric Ry. Historical Society, 7625 W. Gregory St., Chicago 31, Ill. Written by David W. Chambers and priced at \$2.50, this 52-page work contains many fine views of trolleys, in Purdue's collection of full-size steam locos and interurban test car, all now in St. Louis Museum of Transport.

THE PACIFIC ELECTRIC SOUTHERN DISTRICT, 48 pages, with photos, maps, and histories, is the latest in a series of PE publications by Ira Swett, 1416 S. Westmoreland Ave., Los Angeles 6, Calif. \$2 each.

CHEMIN DE FER DE LA BONNE-SAÏNTE ANNE (1889-1959), by Omer S. A. Lavallee, tells the story in words, 43 photos, maps, diagrams, etc., of the Canadian National's 25-mile line between Quebec and St. Joachim, which ceased electric operation last March. The line was formerly Quebec Ry., Light & Power Co. Mr. Lavallee's 16-page book is sold at 50 cents a copy by Canadian Railroad Historical Ass'n, Box 22, Station B, Montreal, Canada. Proceeds will be devoted to buying ORL&P rolling stock and moving it to Montreal, adding to the Association's growing historical collection.

The book is written in both English and French, in parallel columns (U.S. readers may enclose U.S. currency, personal check, or International Money Order, obtainable at any post office.) ●

OCTOBER, 1959



When completed in 1961, the new downtown terminal in Seattle, Wash., will look like this. Trip to **Century 21 Exposition**, more than a mile away, will take only 94 seconds. Each airtrain will be built with accommodations for 96 passengers.

STEAM ENGINES ON DISPLAY (Continued from page 33)

without fencing. Maine Central takes good care of its 470 which rests on company property. Ontario Northland's 701 stands near its Englehart station, is well kept, and is flood-lit at night.

While the Minnesota Railfans Association and the Pacific Coast Chapter of the Railway & Locomotive Historical Society are the only two fan groups we know of that own full-size steam locomotives, railfans have played a conspicuous part in obtaining and installing most of the preserved exhibits. For example, the Austin (Minn.) Model Railroad Club not only aided considerably in moving the Milwaukee Road's 1004 to Mower County Fair Grounds but two teen-age sons of Harold Davidson even stayed with the Ten-wheeler overnight during several days of intricate street movement.

Here is our list:

UNITED STATES

ALABAMA

Birmingham, Fair Grounds—Frisco 4018 (2-8-2)
Brewton—T. R. Miller Mill, 101 (2-6-2)
Chapman—W. T. Smith Lumber Co., 7 (2-6-0) and 14 (4-4-0)

ALASKA

Fairbanks, Alaska RR. passenger station—ARR 1 (0-4-0), built by H. K. Porter in 1887, n.g., ex-Tanana Mines Ry.

ARIZONA

Chandler, City Park—SP 2562 (2-8-0), Baldwin '06
Globe, Veterans Park—SP 1774 (2-6-0), Baldwin '02
Kingman, City Park—Santa Fe 3759 (4-8-4), Baldwin '28
Mesa, Pioneer Park—SP 2355 (4-6-0), Baldwin '12
Tucson, Arizona Historical Society—SP 1673 (2-6-0), Schenectady 1900
Wickenburg, Stone Park—Santa Fe 761 (2-8-0), Baldwin 1900
Yuma, old Customs House—SP 2521 (2-8-0), Baldwin '07, Fenced in

ARKANSAS

Fort Smith, Exposition Grounds—Frisco 4003 (2-8-2)
Paris—Ft. Smith, Subiaco & Rock Island 2252 (4-6-0) ex-MP
Pine Bluff, Oakland Park—Cotton Belt 819 (4-8-4), company shops '42, F
Texarkana, Four States Park—KCS 253 (0-8-0), Alco '22, F
Warren, City Park—Southern Lumber Co. 123 (4-6-0), ex-Warren & Quachita Valley

CALIFORNIA

Alameda, Washington Park—SP 1227 (0-6-0), Lima '15
Alturas, Rachel Dorris Park—SP 2718 (2-8-0), Baldwin '04
Arcadia—Y&T 20, "Empire" (2-6-0), owned by C. C. Bong
Arcata—Arcata & Mad River 7 (2-truck Shay)
Bakersfield Pioneer Village—SP 2914 (4-8-0), Schen. '98
Calxico, International Park—SP 2458 (4-4-2)
Camino—Michigan-California Lumber 1 (0-4-0), 2 (2-truck Shay), 4 (0-4-0T)
Caspas Camp—Caspas, South Fork & Eastern 2 (0-4-2T)
Coulterville—Merced Gold Mining 1 (0-4-0)
Death Valley, desert—Death Valley 2 (2-8-0) narrow gauge
Del Mar, Fair Grounds—SD&AE 104 (2-8-0), Baldwin '04, ex-SP 2720
Dunsmuir, ball park—SP 1727 (2-6-0), Baldwin '01
El Centro, Fair Grounds—SP 2353 (4-6-0), Baldwin '12
Eureka, Fair Grounds—Camp Grant & Eureka 1, "Falk" (0-4-0)

Fort Bragg, Company—Glenn Blair Co. 1 (0-4-0T)
Fresno, Rooding Park—SP 1238 (0-6-0), Baldwin '18
Hanford, Burris Park—SP 215 (0-4-0), Baldwin '13
Imperial, Fair Grounds—Imperial Irrigation District 2 (0-6-0T)
Independence, Eastern Calif. Museum Asso.—SP 18 (4-6-0), Baldwin '11, n.g., F
Los Angeles, Santa Fe roundhouse—Pioneer Mills 1 (0-4-2T) and 3 (0-6-0), both owned by Robt. Day; Santa Fe 1010 (2-6-2)
Los Angeles, Travel Town—Camino, Placerville & Lake Tahoe 2 (3-truck Shay); Los Angeles Harbor Dept. 15 and 32 (both 0-4-0T), Alco '14; Oahu Sugar 5 (0-6-2T), n.g.; Pickering Lumber 3 (Heisler); Santa Fe 664 (2-8-0), Baldwin '99, F; Santa Maria Valley 1000 (2-8-2); Sharp & Fellows 7 (2-6-2), Alco '02, ex-Tonopah & Tidewater; SP 1273 (0-6-0) company shops '21, and 3025 (4-4-2), Schen. '04; Stockton Terminal & Eastern 1 (4-4-0), built '67, ex-Cent. Pac. "Klamath"; Sou. Calif. Motor Road 21 (0-4-0, dummy), Baldwin '82; UP 4439 (0-6-0), and WP 26 (2-8-0), Alco '09
Los Angeles, UP roundhouse—Virginia & Truckee 25 (4-6-0), Baldwin '05, owned by RKO Studio
Martinez, City Park—SP 1258 (0-6-0), company shops '21
Monterey, El Estero Park—SP 1285 (0-6-0), Lima '24
Oakland, Auditorium—Central Pac. 223 (2-6-2T), co. shops '82
Oakland WP roundhouse—Nevada Central 2 (2-6-0), n.g.; North Pac. Coast 12 (4-4-0), n.g., Baldwin '76, ex-NC 5; V&T 12 (4-4-0), "Genoa", Baldwin '72, and 13 (2-6-0), "Empire", Baldwin '72, and 21 (2-4-0), "J. W. Bowker", Baldwin '75, owned by R&LHS, Pacific Coast chapter
Orland, Fair Grounds—SP 2852 (2-8-0), company shop '19
Pale Alto, Stanford University—Central Pacific 1 "Gov. Stanford" (4-4-0), Norris 1863
Pamona, L.A. County Fair Grounds, Fruit Growers Supply 3 (Climax); Outer Harbor Terminal 2 (0-6-0); Potash 3 (2-8-0), Baldwin '03, n.g.; Santa Fe 3450 (4-6-4), Baldwin '27; SP 5021 (4-10-2), Alco 26, and UP 9000 (4-12-2)
Pasadena—Rouge River 2 (0-4-0T), owned by C. O'Connor
Placerville, Fair Grounds—Diamond & Caldor 4 (Shay)
Portola, stored—WP 94 (4-6-0), Alco '06
Quincy, Fair Grounds—Feather River Lumber 8 (2-6-2)
Richmond, Nicholl Park—SP 1269 (0-6-0), co. shops '21
Riverside, City Park—UP 6051 (2-8-0), Baldwin '07, F
Roseville, Fair Grounds—Sacramento Brick (0-4-0T), n.g.; SP 2252 (4-6-0), Cooke '97, and Alaska RR. 18 (4-6-0), n.g.
Sacramento, SP depot—Cent. Pac. 1, "C. P. Huntington" (4-2-0), Cooke '63, and SP 4294 (4-8-8-2), Baldwin '44
Salinas, Central Park—SP 1237 (0-6-0), Baldwin '44
San Bernardino, Old Women's Springs Ranch—Oahu Sugar 1 (0-4-2), n.g.
San Bernardino, Viaduct Park—Santa Fe 3751 (4-8-4), Baldwin '27, F
San Bernardino, County Museum, Bloomington—SP 2825 (2-8-0), Brooks '08
San Francisco, Fleishaker Park—SP 1294 (0-6-0), Lima '24
San Jose, Fair Grounds—SP 2479 (4-6-2), Baldwin '23
San Mateo, Fair Grounds—SP 2472 (4-6-2), Baldwin '21
Santa Cruz, City Park—SP 1298 (0-6-0), Baldwin '17
Santa Maria, Fair Grounds—Santa Maria Valley 205 (2-6-2)
Scotia—Bolveer & Carson 5 (Heisler) and Mt. Tamalpais & Muru Woods 9
Standard—Pickering Lumber 2 (2-truck Shay)
Stockton, Junior Museum—SP 1251 (0-6-0), shops '19
Tiburon, NWP Roundhouse—NWP 112 (4-4-0), Alco '08
Tracy, Powers Park—SP 1293 (0-6-0), Lima '24
Tuolumne, stored—West Side Lumber 2 (Shay) n.g., and Sierra 3 (4-6-0), Rogers 1891, ex-Prescott & Ariz. Central 9
Watsonville—SP 2706 (2-8-0), Baldwin '04
Willits—California Western 12 (2-6-2T); Hecla Mining 17 (0-4-0T), n.g., and Pacific Lumber 38 (Climax)
Woodland, Fair Grounds—SP 1233 (0-6-0), Baldwin '18

COLORADO

Alamosa, Narrow Gauge Motel—D&RGW 169 (4-6-0), n.g., F
Boulder—Denver, Boulder & Western 30 (2-8-0), n.g., F. May be scrapped because vandals wrecked it in 1958
Central City—C&S 71 (2-8-0), Baldwin '97, n.g., F
Colorado Springs—D&RGW 168 (4-6-0), n.g., and Manitou & Pikes Peak 1 (0-4-0T, rack engine)
Denver—UP 6357 (2-8-0)
Durango—D&RGW 315 (2-8-0), n.g.
Golden, Iron Horse Motel & Museum—D&RGW 346, "Cumbres" (2-8-0), n.g., built 1922; Florence & Cripple Creek 318, "Goldfield" (2-8-0), n.g.; and Rio Grande Southern 20 (4-6-0), n.g.
Gunnison—D&RGW 268 (2-8-0), n.g.
Idaho Springs—C&S 60 (2-8-0), Rhode Is. '86, n.g.
La Junta, First St.—Santa Fe 1024 (2-6-2), Baldwin '01
Lamar, City Park—Santa Fe 1819 (2-6-2), Baldwin '06, F

Montrose—D&RGW 278 (2-8-0), n.g.
Salida—Koppers Co. (0-4-9T), 2-ft. gauge

CONNECTICUT

Warehouse Point, Conn. Elec. Ry. Museum—Hartford Elec. Light 5 (0-4-0T)

DELAWARE

No steam locomotives that we know of

DISTRICT OF COLUMBIA

Washington, Smithsonian Institution—Camden & Amboy "John Bull" (2-4-0), rebuilt, and D&H "America" (or "Pride of Newcastle"), replica, and D&H "Stourbridge Lion," replica, and Southern 1401 (4-6-2), Richmond '28, stored for future display

FLORIDA

Bradenton, City Park—SAT 2 (2-6-2), Baldwin '12, ex-Manatee Crate, ex-Brooks-Scanlon Lumber, ex-Taylor City Lumber
Century—Alger-Sullivan Lumber Co. 100
Port St. Joe—St. Joe Lumber & Export 11 (2-6-2), Baldwin '17
Tampa, stored shops—ACL 1504 (4-6-2), Brooks '19

GEORGIA

Albany—Georgia Northern 107 (4-6-0)
Atlanta, Lakewood Park—A&W 209 (4-4-2), Lima '26
F. Southern shops—SR 1509 "Maud" (0-4-0), Cyclorama, Grant Park—W&A "Texas" (4-4-0)
Augusta—Georgia 302 (2-8-2), F
Columbus—C. of Ga. 451 (4-8-4), Lima '43
Macon, stored—C. of Ga. 8 (0-6-0T), Baldwin '86, and 509 (2-8-0), Baldwin '06
Moultrie—Ga. Northern 105 (2-8-2)
Savannah, stored—C. of Ga. 349 (4-4-0), Baldwin '91
Town not known to us—Ga. Northern 102 (4-6-0)

HAWAII

Island of Kauai, Grove Farm (last Hawaiian sugar plantation to use steam)—2 large Baldwin stored in roundhouse, old German-built "Paulo" on exhibition. (Details coming soon.) Other locos used in Hawaii are now on display in Calif.

IDAHO

Nampa—UP 616 (2-8-0)
Pocatello—UP 2005 (2-8-2)

ILLINOIS

Chicago, Museum of Science & Industry—B&O "York" built 1831; "John Stevens," replica of first experimental steam loco in U.S.; Nathez & Hamburg "Mississippi," built 1834; "Rocket," replica of loco that Stephenson built in England, and C&NW "Pioneer" (4-2-0), stored
Markham, stored—IC 1401 (2-4-4T)
Peoria, Glen Oak Park—RI 886 (4-6-2), Alco '09 F
Silvis, stored—RI 9 (4-6-0), Held by railroad for exhibition purposes

INDIANA

Ft. Wayne, Swinney Park—Lake Erie & Ft. Wayne (Wabash) 1 (0-6-0), Alco '06, ex-Wab. 534, F
Hammond, Civic Center—NKP 624 (2-8-2), Lima '22, F
Indianapolis, Broad Ripple Park—NKP 587 (2-8-2), Baldwin '18, F

IOWA

Mt. Pleasant, McMillan Park—(0-4-0T), Davenport '25
Sioux City, Auditorium—GN 1355 (4-6-2), Baldwin, rebuilt (4-6-0), F

KANSAS

Abilene, Eisenhower Park—Santa Fe 3415 (4-6-2), Baldwin '19, F
Arkansas City, Wilson Park—Santa Fe 2542 (2-8-0), Alco '11
Atchison, Union Station—Santa Fe 811 (2-8-0), Baldwin '02, F
Chanute, Santa Fe—762 (2-8-0), Baldwin 1900, F
Coffeyville, Johnson Park—Santa Fe 1079 (2-6-2), Baldwin '02
Dodge City, Boot Hill Museum—Santa Fe 1139 (2-6-2), Baldwin '03, F
Emporia—Santa Fe—Santa Fe 1015 (2-6-2), Baldwin '01, F
Fort Riley Museum—UP 6072 (2-8-0)
Garden City—Garden City Western Ry. 25 (2-6-0)
Great Bend—Santa Fe 3416 (4-6-2), Baldwin '19, F
Hutchinson Fair Grounds—Santa Fe 735 (2-8-0), Baldwin 1900
Independence, Riverside Park—Santa Fe 1050 (2-6-2), Baldwin '02
Kinsley, Highway—Santa Fe 3424 (4-6-2), '21, F

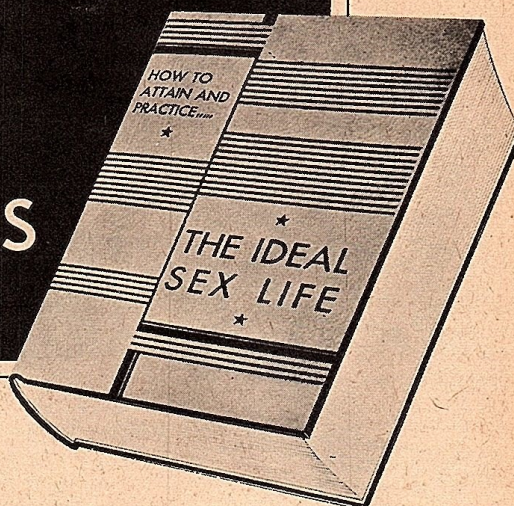
RAILROAD

*Married Happiness Can Last Forever
with these*

SEX INSTRUCTIONS

For Adults Only

by **DR. J. RUTGERS**

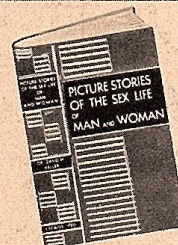


70 Simply Written Frank Chapters!

Readers of this all-complete book (one of the largest on married sex practice) have learned so much more than they thought possible! Practically every type of married sex problem and every age is individually treated. Shows how to carry out the detailed instructions. Experience the supreme satisfaction of a longer, happier married sex life and abolish the dangers of wrong sex notions. 150,000 illuminating words help establish the necessary desired cooperation between husband and wife. One of the most up-to-date books, the latest improvements, methods, etc., that should be known. This treasure is yours now for only \$2.98 (originally \$6.00).

Partial Contents of "Ideal Sex Life"

- Modern methods of sex hygiene—for male and female sex organs.
- Latest sex discoveries for improving sexual practice.
- Role of husband and wife in the sex act.
- Reactions of man and woman compared.
- The perfect sex act.
- Step by step plan for wedding night and honeymoon.
- Avoiding harmful mistakes of newlyweds and older married couples.
- "Rejuvenation treatments" for increasing sex potency of man and woman.
- What causes the sexual urge.
- Sex attraction and art of courtship for woman, man.
- Modern art of mutual sex satisfaction.
- Natural birth control.
- Foreign sex practices.
- Attaining Pregnancy.
- Ideal sex techniques and methods for satisfactory sex act.
- Overcoming frigidity in women.
- Preventing dangers of children's sex life.
- Art of love for different ages and types of men and women.
- Advice for aged married people.
- Attaining the greatest satisfaction in sex life.
- 4 kinds of sexual satisfaction.
- Avoiding too much or too little sex life.
- Overcome physical hindrances for ideal sex practice.
- Avoiding dangerous sex relations.
- Degeneracy facts of sex.
- The male and female sex organs.
- Strengthening man's sex virility and sex control towards ideal mutual climax.
- Importance of caresses, embraces for ideal sex life.
- Sources of Disease.
- Sex act regarding change of life, pregnancy.
- The problem of self-satisfaction.
- Sexual Case Histories.
- How to treat abnormal cases.
- Art of choosing a mate for ideal married sex life.
- Plus many more enlightening chapters—every one in simple frank words!



FREE Picture Book

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With order of "The Ideal Sex Life" we give you FREE "Picture Stories of the Sex Life of Man and Woman." 317 illustrations with detailed explanations of the sexual side of the human body.

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- Facts to know on bridal night.
- Sex organs illustrated and explained.
- Women's change of life, menstruation.
- Calendar showing days of Fertility—Sterility.
- How sex system of man and woman works.
- The structure of female breasts.
- Pictures how pregnancy takes place.
- How sex vitality is produced in man, woman.
- Unusual cases, and hundreds more...

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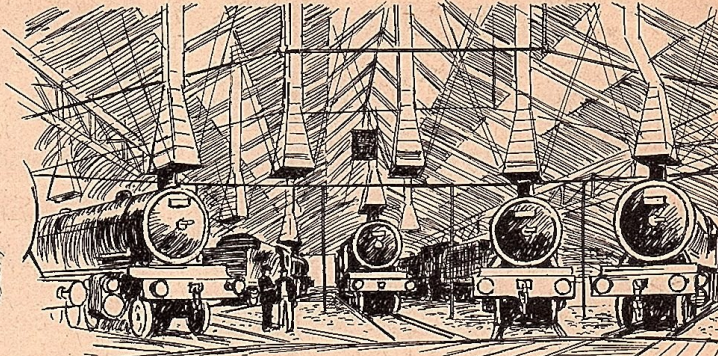
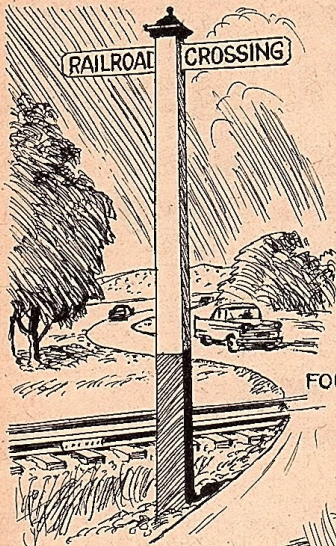
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OCTOBER, 1959

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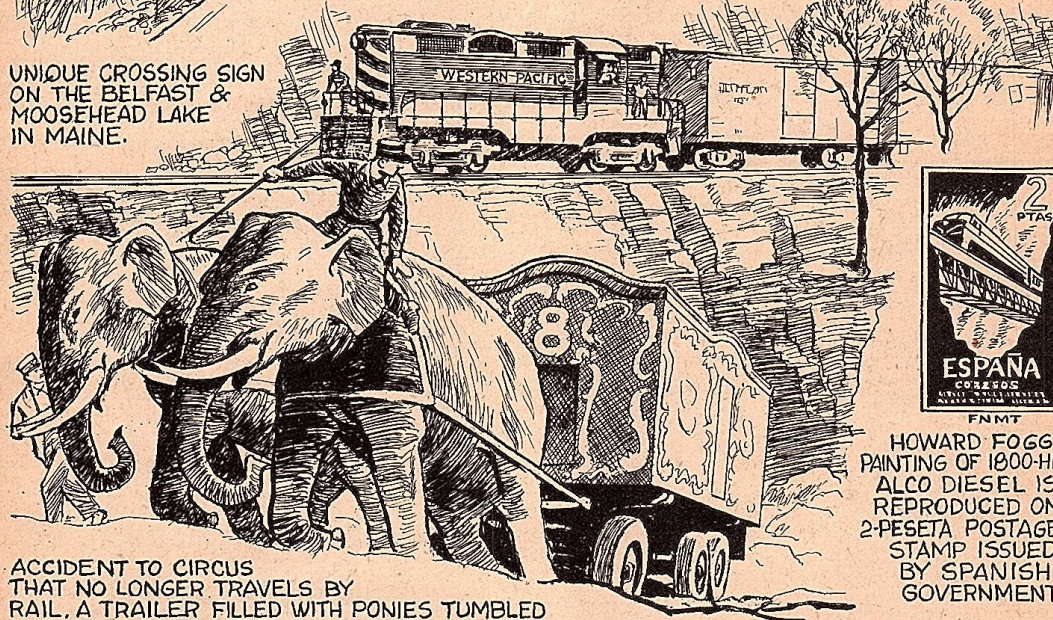
Along the Iron Pike

by Joe Easley



FOUR TURNTABLES UNDER ONE ROOF IN BRITISH RAILWAYS' OLD OAK COMMON LOCOMOTIVE SHED, LONDON, STILL SERVING PADDINGTON STATION. THEY FORM FOUR CORNERS OF A SQUARE, EACH WITH A FULL SET OF TRACKS RADIATING FROM IT.
(R.J. Sandusky, R.R. 6, Brampton, Ont., Canada.)

UNIQUE CROSSING SIGN ON THE BELFAST & MOOSEHEAD LAKE IN MAINE.



ACCIDENT TO CIRCUS THAT NO LONGER TRAVELS BY RAIL. A TRAILER FILLED WITH PONIES TUMBLED OFF HIGHWAY 89 BESIDE WESTERN PACIFIC TRACK. FREIGHT-TRAIN CREW SAW ELEPHANTS RESCUE IT.
(Based on Sacramento Bee photo)



HOWARD FOGG PAINTING OF 1800-HP ALCO DIESEL IS REPRODUCED ON 2-PESETA POSTAGE STAMP ISSUED BY SPANISH GOVERNMENT.



FAST MAIL BEGAN OPERATION ON THE BURLINGTON IN 1884 BETWEEN COUNCIL BLUFFS AND OMAHA.

Lawrence, Central Park—Santa Fe 1073 (2-6-2), Baldwin '02
 Marysville—UP 460 (2-8-0)
 Newton, Military Park—Santa Fe 1880 (2-6-2), Baldwin '07, F
 Pittsburg, Schlanger Park—KCS 1023 (0-8-0), Alco '06, ex-2-8-0, F
 Salina—UP 477 (2-8-0)
 Topeka, stored—Santa Fe 1 (2-8-0)
 Topeka, Fair Grounds—Santa Fe 3463 (4-6-4), Baldwin '37, F
 Wellington, Sellers Park—Santa Fe 1067 (2-6-2), Baldwin '02, F
 Wichita, Friends University—Santa Fe 3768 (4-8-4), Baldwin '37, F

KENTUCKY

Louisville, Kentucky RR. Museum, Eva Boardman Park—L&N 152 (4-6-2), Rogers '06, F

LOUISIANA

LaFayette, City Park—SP (T&NO) 743 (2-8-2), company shops '21
 New Orleans, Audubon Park—SP (T&NO) 745 (2-8-2), company shops '21
 Ponchatoula, private owner—Louisiana Cypress 1 (2-6-2) and La. Cyp. 2 (2-6-0)
 Ponchatoula, Company exhibit—La. Cyp. 3 (2-8-0)
 Shiloh—Red River & Gulf 104 (4-4-0), ex-SP
 Shreveport, Ford Park—Dardanelle & Russellville 10 (2-6-0), Cooke '07, used on Panama Canal

MAINE

Orno, Crosby Lab., Univ. of Me.—"Lion," built 1840
 Waterville, depot—Maine Cent. 470 (4-6-2)

MARYLAND

Baltimore, B&O Museum—B&O "Tom Thumb," 1829, replica; "Atlantic," built 1832; "John Hancock," 1835; "LaFayette," Norris 1837; 57, "Memnon" (0-8-0), 1840; "Wm. Mason" (4-4-0), Mason 1856; 117
 "Thatcher Perkins" (4-6-0), co. shops '63; and 545
 "A. J. Cromwell" (2-8-0), co. shops '88; CNJ 592 (4-4-2), Alco '01, Camelback, and WMD 6 (3-truck Shay), Lima '45
 Hagerstown, Municipal Park—WMD 202 (4-6-2), Baldwin '12, F

MASSACHUSETTS

Boston—B&M 3717 (4-6-2)
 South Carver, Edaville Railroad—B&M 1455 (2-6-0), Manchester '07; Lehigh Navigation & Coal 3 (0-4-0T), n.g.; Newfoundland 1 (0-4-0T), n.g.; from Elkins, W. Va. Climax built by Mason; Raritan Copper Works (0-4-0T), n.g.; and Vermilion Sugar Co. 1 (4-6-0), ex-SP (TNO)

MICHIGAN

Ahmeal, stored—Hecla & Torch Lake "Torch Lake" (Mason bogie), built '73, n.g.
 Dearborn, Greenfield Village—Atlantic & Gulf "Satilla" (4-4-0), Rogers '40; C&O 160 (2-6-4-6), Lima '44, Detroit & Lima Northern (DT&L) (4-4-0), Baldwin '97; Edison Portland Cement (0-4-0T), Vulcan '23; Lake Shore & Michigan Southern (4-4-0), Mason '68; Michigan Central (4-4-2), Schen. '02; Toledo-Detroit (DT&L) (4-4-0), Baldwin '15; Wayne County Road Commission (0-4-0T), Davenport '22; (2-6-0), Grant 1865; and (2-6-0), Nord (French) '89
 East Lansing, MSU Campus—C&O 1225 (2-8-4), Lima '41
 Hancock, stored, Quincy Mining Co.—Quincy & Torch Lake 1 (2-6-0), n.g.; 3 (2-6-0), Brooks '94, n.g.; 5 (2-8-0), n.g.; and 6 (2-8-0), Baldwin, n.g.
 Jackson, N. Lawn Park—GTW 5030 (4-6-2), Alco '12
 Traverse City, City Park—Lumber Co., Porter
 Whitmore Lake Logging Museum—Five Climaxes and Shays

MINNESOTA

Austin, Fair Grounds—Milw. 1004 (4-6-0), Baldwin 1900, F
 Brainerd, NP Shop—NP 10 (0-6-0), BLW '96 Baldwin
 Chisholm, Mining Museum—DM&IR 347 (2-8-0), Alco '07
 Dilworth, City Park—NP 1068 (0-6-0), Manchester '07
 Duluth, Fairmont Park—NP 2435 (2-6-2), Also '07
 East Grand Forks, City Park—NP 2153 (4-6-2), Baldwin '09
 Mountain Iron, company yard—Ore Co. (0-8-0)
 St. Paul, Union Depot—GN 1, "Wm. Crooks" (4-4-0), built '61
 St. Paul, NP roundhouse—NP 1, "Minnetonka," (0-4-0), Smith & Porter '70, exhibited at on-line points
 St. Paul, Como Park—NP 2156 (4-4-2), Baldwin '09
 Stillwater, Lovell Park—NP 328 (4-6-0), Rogers '05, owned by Minn. Railfans Assn.
 Thief River Falls, depot—Soo Line 1024 (2-8-2), Alco '12, F
 Two Harbors, Van Hoven depot, Duluth & Iron Range 3 (2-6-0), Baldwin '83

OCTOBER, 1959

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\$1400 from Outdoor Life

"Sold an article on hunting to 'Outdoor Life' for \$400—that makes \$1400 from them, plus two stories to 'The Trapper,' and several to other men's magazines. The time put in on your course was the most valuable I ever spent."—Ray Beck, Knox, Pa.

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MISSISSIPPI

Amory—Frisco 1529 (4-8-2)
Meridian, City Park—Meridian & Bigbee River (4-6-2)

MISSOURI

Kansas City, Swope Park—Frisco 1352 (2-8-2), and 4500 series (4-8-4)
Marceline, depot—Santa Fe 2546 (2-8-0), Alco '11
Rolla, City Park—Frisco 1501 (4-8-2)
Springfield, Grant Beach—Frisco 4524 (4-8-4)
Sedalia Fair Grounds—Frisco (4-8-4)
St. Louis, Museum of Transport, Barrets Station Road, Kirkwood—Alton & Southern 12 (0-8-0); Boston & Albany 39 (4-4-0); Eddy Clock, built '73; B&O 173 (4-6-0); Davis Camelback, company shops '73; C&M 551 (2-8-2), Lima '28; CNR 5529 (4-6-2), Montreal Loco, Works '04; C&NW 274 (4-4-0), Baldwin '73; C&NW 1015 (4-4-2), Alco 1900; C&O 2727 (2-8-4), Alco '44; DL&W 952 (4-4-0), Camelback; IC 764 (2-8-0), '04; Laclede-Christy, (0-4-0T), n.g.; (0-4-4T), Forney; MKT 311 (4-4-0), Baldwin 1890; MP 635 (4-6-0); NKP 170 (4-6-4), Alco '27; N&W (2-8-2); Reading "Black Diamond" (2-2-2 inspection engine), Baldwin '89; Frisco 1522 (4-8-2); and 3695 (0-6-0); Lott, Scullin Steel No. 95; TRRASL 146 (0-6-0) and 318 (0-8-0), built 1926; SP 4460 (4-8-4), Lima '43; Wabash 573 (2-6-0), Rhode Is. '99, and Union Electric I (0-4-0)

MONTANA

Billings, Museum, Branch Mint RR. I "Natatlone" (0-4-0T)
Billings, Yellowstone Historical Museum—NP 1031 (0-6-0), Alco '03
Bonner—Anacoda 7 (Shay)
Butte, Civic Center—NP 75 (2-8-0), Schen. '99
Helena, Beattie Park—NP 1382 (4-6-0), Baldwin '02
Missoula, depot—NP 1356 (4-4-0), Baldwin '02

NEBRASKA

Columbus—UP 561 (2-8-0), Baldwin '04
Fairbury—UP 421 (2-8-0),
Gehring—UP 423 (2-8-0)
Grand Island—UP 437 (2-8-0)
Hastings—UP 6237 (2-8-0)
Kearney—UP 481 (2-8-0)
Lexington—UP 485 (2-8-0), Baldwin '03
Lincoln, stored for exhibition—CBQ 35, 4-4-0
Lincoln, Pioneer Park—CBQ 710 (4-6-0), co. shops '01
Lincoln, Fair Grounds—UP 440 (2-8-0)
Minden, Pioneer Village—CBQ 967 (4-6-0), Baldwin '89; 27 I (0-4-0T), Porter '88, n.g., and ?? 2 (0-4-0T), Porter '88, n.g.
North Platte—UP 480 (2-8-0), Baldwin '03
Sidney—UP 407 (2-8-0)

NEVADA

Carson City, State Museum—Lake Tahoe Railway & Transp. I "Glenbrook" (2-6-0), n.g., F
Carson City, Eagle Territory RR. Museum—SP 8 (4-6-0), Baldwin '07, n.g.
Las Vegas—Locomotives owned by Last Frontier gambling house have been sold. Disposition unknown to us.
Pioche—Pioche Pacific (2-6-0), Schen. '09, n.g., ex-C&NW 279

NEW JERSEY

No steam locomotives on display that we know of, except at Pine Creek operating museum near Freehold.

NEW HAMPSHIRE

Base Station, Mt. Washington Cog. Ry. "Old Peppercorn" (0-2-2-0, cog)
Lake Tarleton—(0-4-0T), built by Porter
North Woodstock Beebe River (Climax) and East Branch & Lincoln 5 (Shay)

NEW MEXICO

Albuquerque, Coronado Park—Santa Fe 2926 (4-8-4), Baldwin '44, F
Clovis, Hillcrest Park—SFe 9005 (0-6-0), Baldwin '06
Las Vegas, City Park—SFe 1129 (2-6-2), Bal. '02, F

NEW YORK

Blue Mountain, Adirondack Museum—Marion County (0-4-0T), built by Porter
Glen Cove, L. I.—? (0-4-0T), Davenport '12
LeRoy—? 3 (0-4-0T), Vulcan '22
Salisbury, L. I., Nassau County—LIRR 35 (4-6-0), Pennsy '28, F
Sandy Point, Rail City Museum—Bath & Hammond-sport 11 (2-6-0), Cooke '23; Diamond Coal (0-4-0T), n.g.; Gray Lumber 21 (2-6-2), n.g.; Huntington & Broad Top Mt. 38 (2-8-0); Solvay Process 49 and 10 (saddle tank)
Stony Brook, L. I., Carriage House Museum—LIRR 38 (4-6-0), PRR '28. Actually she is No. 39 with

the 38's number plate. No. 39's plate was presented to Roy Campanella, Dodgers player 39.

NORTH CAROLINA

Rocky Mount, stored—ACL 250 (4-6-0)
Winston-Salem, Reynolds Park—Southern 542 (2-8-0), Baldwin '03

NORTH DAKOTA

Bismarck, Camp Hancock—NP 2164 (4-6-2), Baldwin '09
Enderlin, City Park—Soo Line (WC) 2425 (2-8-0), Alco '09, F
Harvey, depot—Soo Line 440 (2-8-0), Alco '03, F
Minot, Roosevelt Park—Soo Line 735 (4-6-2), Alco '11, F
Williston, depot—GN 3059 (2-8-2), F

OHIO

Canton, Duerber Park—NKP 360 (0-6-0), W&LE '35, F
Cleveland, Brookside Park—C&O 2707 (2-8-4), Alco '43
Lima—Lima Stone Co. (Shay)
Worthington, Ohio Ry. Museum, Marble Cliff Quarries (0-4-0T), Vulcan '14

OKLAHOMA

Ardmore, City Park—Santa Fe 1108 (2-6-2), Baldwin '02, F
Barflesville, Johnstone Park—Santa Fe 940 (2-10-2), Baldwin '03, F
Blackwell, Children's Home—Santa Fe 1906 (2-6-2), Baldwin '02, F
Enid, State School—RI 938 (4-6-2), Alco '10, NF
Enid, Government Springs—Frisco 1519 (4-8-2)
Fairview, City Park—Santa Fe 2522 (2-8-0), Alco '10, F
Oklahoma City, Fair Grounds—Santa Fe 643 (2-8-0), co. shops '97
Pauls Valley, Wacker Park—Santa Fe 1951 (2-8-0), Baldwin '07, F
Tulsa, Mohawk Park—Frisco 4500 (4-8-4), '42

OREGON

Klamath Falls, Veterans' Memorial Park—SP 2579 (2-8-0), Baldwin '06
Portland, Forestry Bldg.—Stimson Lumber I (Shay), Lima '09, F
Portland, Oaks Park—Mount Emily Lumber I (Shay); SP 4449 (4-8-4), Lima '41; SP&S 700 (4-8-4), Bal. '38
Portland Union Station—"Oregon Pony," Vulcan '61, F; UP 3203 (4-6-2), Baldwin '05; Valley & Siletz 17 (2-8-2)
Roseburg, Stewart Park—SP 1229 (0-6-0), Lima '15
Sewell—Oregon-American Logging 104 and 105 (both shays)
Springfield City has asked Weyerhaeuser to donate "Old 100" (see page 6)
Spring Creek—Mt. Shasta Pine Co. (0-4-0), Baldwin '84
Verona, International Paper Co., Long-Bell Div.—102 (Shay)
Woodburn, Cleveland & Woodburn sts.—SP 1785 (2-6-0), Baldwin '02

PENNSYLVANIA

Altoona, Horseshoe Curve Pennsy 1361 (4-6-2), co. shops '18
Bear Creek, stored—LY I "Dorothy" (4-2-2, inspection eng.)
Bessemer & Lake Erie has a 2-8-0 stored somewhere on its line for exhibition, also 643 (2-10-4)
Birdsboro, Brooks Iron Co.—4 (Camelback) and 2 (0-4-0T), built by Porter, and Rdg. 1187 (0-4-0)
Kintz, Lukens Steel Co.—(0-4-0T), n.g.
Northumberland, Pennsy locos in storage—460 (4-4-2); 5741 (4-6-0), G-5; 7002 (4-4-2), E-3; 1223 (4-4-0), D-16; 1187 (2-8-0), R; 94 (0-4-0), A-5; 2846 (2-8-0), H-6; 35 (?) and "Reuben Wells" (0-10-0T), built 1859
Philadelphia, Franklin Institute—Baldwin 60000 (4-10-2), built '26; Rdg. 3 (4-4-0), built 1846, and (0-4-0), built 1838 in England
Rock Hill Furnace, stored in roundhouse—East Broad Top 12, 14, 15, 17, 18, all n.g.
Waynesburg, Fair Grounds—Waynesburg & Washington (Pennsy) 4 (2-6-0), Alco '16, n.g.

RHODE ISLAND

No steam locos that we know of.

SOUTH CAROLINA

No steam locos that we know of.

SOUTH DAKOTA

Deadwood—"J. B. Higgin" (0-4-0)
Oblivion, Black Hills Central Museum—BHC 9 (Mogul), "Chief Iron Horse," Cooke 82, ex-C&S, n.g. (See Aug. 59 Railroad Magazine)

TENNESSEE

Chattanooga, L&N station—W&A "General" (4-4-0)
Chattanooga, Southern station—"Best Friend of Charleston," replica (?)
Erwin, Highways 19 and 33—Black Mountain 1 (4-6-0) ex-Clinchfield, originally CC&I (Pennsy), built by PRR at Logansport shop
Jackson, Casey Jones Museum—Clinchfield 99 (4-6-0), Baldwin, ex-Black Mt.
Memphis—Frisco 1351 (2-8-2)
Nashville, Centennial Park—NC&StL 576 (4-8-4), Alco '42

TEXAS

Abilene, Fair Grounds—Paris & Mt. Pleasant 75 (4-6-0) ex-T&P
Amarillo—Santa Fe 5000 (2-10-4), Baldwin '30, F
Austin, City Park—SP 786 (2-8-2), Brooks '16
Baytown, Roseland Park—SP 895 (2-8-0), Schen. '13
Beaumont, City Park—SP 975 (2-10-2), Brooks '18
Brownsville, Fort Brown Park—Rio Grande Ry. (not D&RGW) 1 (2-4-0), n.g.
Brownwood, City Park—Santa Fe 1080 (2-6-2), Baldwin '02, F
Childress, depot—FW&D 501 (4-6-2), Baldwin '10
Cleburne, City Park—Santa Fe 3417 (4-6-2), Baldwin '19, F
Dallas, Fair Grounds—T&P 909 (4-8-2), ex-NYC 3001 (replaces original T&P engine damaged by vandals), Alco '40
El Paso, SP Office Bldg.—El Paso & SW I (4-4-0), Breese-Kneeland 1857; Union Depot—SP 3420 (2-8-0), Baldwin '04
Fort Worth, Will Rogers Memorial Park—T&P 610
Houston, Hermann Park—SP (T&NO) 892 (2-8-0), Lima '13
Port Arthur, Bryan Park—KCS 503 (4-6-0), Baldwin '20, F
San Angelo, Fort Concho Park—Santa Fe 1316 (4-6-2), Baldwin '11, F
San Antonio, Maverick Park—SP 794 (2-8-2), Brooks '16
Slayton, City Park—Santa Fe 1809 (2-6-2), Baldwin '06, F
Snyder, Scurry Park—Roscoe, Snyder & Pacific 5 (2-6-2), Baldwin '20
Temple, Gober Park—Santa Fe 3423 (4-6-2), Baldwin '21, F
Victoria, Memorial Park—SP (T&NO) 771 (2-8-2), Baldwin '13
Wichita Falls, City Park—FW&D 304 (2-8-0), Alco '06, F

UTAH

Ogden, 36th and Wall sts.—SP 1297 (0-6-0), Brooks '08
Ogden, Tabernacle—UP 4436 (0-6-0)
Salt Lake City—D&RGW 223 (2-8-0), n.g.
Salt Lake City, Fair Grounds—UP 618 (2-8-0)
Salt Lake City, Utah Pioneers Park—UP 6264 (2-8-0)

VERMONT

Shelburne, Museum—CVT 220 (4-6-0), Alco '15
White River Jct., City Park—B&M 494 (4-4-0), 1892

VIRGINIA

Abingdon, depot—N&W 433 (4-8-0), Richmond '07
Covington, Playground—C&O 701 (2-8-0), built '11
Roanoke, Wasena Park—N&W 6 (2-8-0), Bal. '97, F.

WASHINGTON

Auburn, City Park—NP 2152 (4-4-2), Baldwin '09, F
Camp Grisdale—Simpson Logging I "C. F. White" (0-4-2T), Porter '85
Centralia, City—Cowlitz, Chehalis & Cascade 25 (2-8-0), F
Chehalis, Roadside Park—CC&C 15 (2-8-2), Baldwin '17, F
Hoquiam, Roadside Park—Rayonier (2-truck Shay), Lima '10
Longview, Library—Long Bell Lumber 5 (Shay)
Longview, Forestry Museum—Weyerhaeuser Timber 108 (2-6-6-2T), F
Newhalen—Seattle Lt. & Power 6 (2-6-0), Baldwin, ex-Skagit River Ry.
Pasco, Volunteer Park—NP 1354 (4-6-0), Baldwin '02
Pasco, NP shops, stored for exhibition—NP 684 (4-4-0), Rome '83
Seattle, Woodland Park—GN 1246 (2-8-0), Baldwin '02
Seattle—Puget Sound Ry. Historical Society owns the following, scattered about the city: Minnesota & Ontario Paper I (0-4-0), Davenport '28; M&O P 2 (2-truck Heisler), 1931; Black Hills & NW (2-6-2T); Columbia River Belt Line 7 (2-4-4-2), Baldwin '09, now on side in river
Sedro-Woolley—Puget Sound & Baker River 2 (4-6-0), Baldwin '13
Shelfton, Brewer Park—Simpson Lumber 7 (3-truck Shay), 1924
Spokane, High Bridge Park—UP 3206 (4-6-2), Schen. '04
Tacoma, Point Defiance Park—NP 1364 (4-6-0), Baldwin '09, F
Vancouver, Short Park—SP&S 539 (2-8-2), Alco '17, F ex-NP 1762

RAILROAD

Wenatchee, City Park—GN 1147 (2-8-0), built '02, F
Woodland, Schurman Machine Works—(0-4-0T),
Porter, n.g.

WEST VIRGINIA

Bluefield, City Park—N&W 7 (2-8-0), Baldwin '97, F
Charleston, Coonskin Park—C&O 2700 (2-8-4), Lima
'43
Princeton, City Park—Vgn. 4 (0-8-0), Baldwin '10

WISCONSIN

Ashland, Soo Ore Dock, U. S. Highway 2—Soo Line
950 (2-10-0), Baldwin 1900, F
Eau Claire, park—Soo Line 2719 (4-6-2), used occa-
sionally in stand-by service.
Fond du Lac, Lakeside Park—Soo Line (WC) 2714
(4-6-2), Alco '14, F
Green Bay, National RR. Museum—Milw. 261 (4-8-4),
Alco '44; Soo Line (WC) 2718 (4-6-2), Alco '23;
"Gen. Pershing" (2-10-2), built by Baldwin for
AEF World War I, later ran on Korean Nat. Rys.;
a C&NW 10-wheeler is promised to Museum.
Marshfield, Wildwood Park—Soo Line (WC) 2442
(2-8-0), Alco '11, F
Milwaukee, south end of harbor—Milw. 265 (4-8-4),
Alco '44, F
Oakwood, operating museum of RR. Fan Club of
Oakwood—WP&Y 4 (4-4-0), Baldwin '12, ex-Klon-
dike Mines
Rhinelander, Logging Museum—Thunder Lake Lbr.
7 (2-8-0), n.g., ex-A. A. Hines Lbr., ex-C&S, ex-
DL&G, ex-DSS&P, in poor condition
Stevens Point, Park near depot—Soo Line (WC)
2713 (4-6-2), Alco '11, F
Waukesha, Frame—Soo Line 2645 (4-6-0), Alco 1900,
F, last actual WC engine prior to Soo control
Wisconsin in Rapids—Consolidated Water Power &
Paper 350 (2-8-0), ex-GB&W, Alco '29, F

WYOMING

Cheyenne, Rodeo Grounds—UP 1242 (4-6-0)
Evanston—UP 4420 (0-6-0)
Rawlins—UP 4533 (2-8-0)

CANADA

ALBERTA

Calgary—City plans to acquire a CPR oilburning
Selkirk type (2-10-4), Class 5900
Edmonton, Exhibition Asso.—CNR 1392 (4-6-0),
Mont. Loco. Works '13

BRITISH COLUMBIA

Deerholme, Vancouver Island—Glencoe Western 24,
25 (both 0-4-0T), n.g.; MacMillan & Bloedel 1
(Shay), owned by Jerry Welburn
Nanaimo, park near CPR wharf—"Wellington," coal-
mine loco, Baldwin '92
Port Alberni, half-mile outside town—MacMillan &
Bloedel 2 (Shay)
Prince George, near CNR station—n.g. loco that
helped to build old Grand Trunk Pacific
Vancouver, Kitsilano Park—CPR 374, built CPR shops
'86, hauled very fast train Montreal to Vancouver
on May 23, 1887
Vancouver, Exhibition Park—CPR 2, "Curly," (Orig-
inally "Emory"), second engine to arrive in B. C.
(1881) to help build CPR. She was built in San
Francisco 1868-69. Served Peru, San Francisco, and
Hastings Mills logging road.

MANITOBA

Winnipeg, CPR Station—CPR 1 "Countess of Duffer-
in" (4-4-0), first loco to enter Western Canada,
1877; ex-NP, ex-Columbia River Lumber Co.

NEWFOUNDLAND

Corner Brook, Rotary Club—Newfoundland Ry.
(CNR) 593 (4-6-2), Baldwin '20, n.g.

ONTARIO

Englehart, depot—ONR 701 (4-6-2), Canadian Loco.
Co. '10, low railing, no fence, maintained by CNR
Hamilton, Gage Park—TH&B 103 (2-8-0), Mont. Loco.
W. '10, F
London—CNR 86 (2-6-0), Canadian Loco. Co. '10
Morrisburg, Ont. & St. Lawrence Development
Comm.—GT 1008 (2-6-0), Canadian Loco. Co. '10

SASKATCHEWAN

Saskatoon, Western Development Museum—CNR
1158 (4-6-0), Montreal Loco. Works '10

YUKON TERRITORY

Carcross, near WP&Y main line—Taku Tram (2 miles
and 1000 feet long, taken over by WP&Y), "Dutch-
ess" (0-6-0), Baldwin '78, burned wood, later oil,
retired 1919

OCTOBER, 1959

53

"THIS WISDOM MUST DIE!"



Truths That Have Been Denied Struggling Humanity

FOR every word that has left the lips of bishops or statesmen to enlighten man, a thousand have been withheld. For every book publicly exposed to the inquiring mind, one hundred more have been suppressed—*damned to oblivion*. Each year of progress has been wilfully delayed centuries. Wisdom has had to filter through biased, secret sessions or ecclesiastical council meetings, where high dignitaries of state and church alone proclaimed what man should know.

Are you prepared to demand the hidden facts of life? Will you continue to believe that you are not capable of weighing the worth of knowledge that concerns your personal freedom and happiness? Realize that much that can make your life more *understandable* and *livable* has been left unexplained or intentionally destroyed. At first by word of mouth only, and now by private discourses, are revealed those truths which secret brotherhoods preserved in ancient temples and hidden sanctuaries, from those who sought to selfishly deprive humanity of them.

THIS free BOOK OF EXPLANATION

Let the Rosicrucians, one of these ancient brotherhoods of learning, tell you about these amazing truths, and explain how you, too, like thousands of others, may now use them to enjoy the fullness of life. The Rosicrucians (not a religious organization) invite you to send today for your Free copy of "The Mastery of Life" with its startling tale of *self help*. Use coupon opposite or address: Scribe L.C.D.



Scribe L.C.D.
THE ROSICRUCIANS (AMORC)
Rosicrucian Park, San Jose, Calif., U.S.A.

Please send me your FREE Book. I am sincerely interested in learning how I may receive these long-concealed facts of life.

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The ROSICRUCIANS
(AMORC)

SAN JOSE, CALIFORNIA, U.S.A.

TOWER MAN

*Trainmaster Burton Doesn't Take Kindly to Boomers, Specifically
Eddie Sand, Who Is Handling a Trick on Pacific Electric*

by HARRY BEDWELL

PUSHING morosely through a swarm of commuters, Eddie Sand entered the huge waiting room of the Pacific Electric at Los Angeles. Eddie was a brass pounder and train dispatcher with more than a touch of gypsy in his blood. He was quite young, judging from his alert swinging stride, his abdomen as flat as an Indian's, and his slender build crowned by a carrot top; but over the years Eddie had garnered a rich harvest of railroad experience along the boomer trail.

Before coming to the PE he had worked only on steam roads, but now—well, he was thinking what to do next. A continuous rumble of juice trains muttered through the cavernous space. Eddie wondered uneasily why that Santa Fe hot-shot's distant whistle the night before had made his sleep fretful. Maybe the high iron that he knew so well was luring him back.

Desperately he smothered the thought. He wanted to be sure he'd had enough of juice operation before pulling the pin.

Blundering into an outward crush of Catalina specials, he disengaged himself from the tourists, slightly battered, and looked around to see who was calling him.

One of the dispatchers said: "Hey, Eddie, there's a letter for you kicking around the office."

Eddie veered to the stairway at the rear of the loading platform. Reaching the dispatcher's office, he picked up the letter. The sight of it made him wince. It came from Wallace Sterling. Dear old big-bodied Walley, his companion in dozens of boomer escapades!

His mind fled back through the

years. As kid telegraph operators, he and Walley had grown up together into professionals, journeying far but coming to rendezvous again and again at intermittent crossings of the careless road. Lately, Walley had enticed him here to the Pacific Electric Railway and then had deserted him shamelessly to wander on to British Columbia for a telegraph job with a logging concern, slightly resentful that Eddie wouldn't go with him.

The letter streamed before Eddie's blue eyes like flashing tape: "All this pike does is haul its own logs . . . Two saddle-tank engines, Nos. 5 and 6, and the track is laid on top of the ground so they can move it about . . . There's not enough work here to interfere with your fishing, and there's plenty of wide-open space, with nobody to push you around . . . But maybe you like better the crowded cities . . ."

Eddie stumbled down the corridor. It was like that guy, always tempting him with far places. He could hear the subdued chatter of telegraph instruments in a lonely night office, high in the mountains, and the distant thunder of a Mallet on a hill. Wanderlust quickened his pulse.

The superintendent's clerk motioned him into the private sanctum. Eddie entered. He'd just finished a relief job at Whittier, California, and the Old Man had called him in. A guilty hope insinuated that the super might not have another job for him right now, which would be a good excuse to move northward into Canada.

Mr. O. J. Donaldson did not look up. He was studying by turns a

trainman's accident report and a lurid newspaper story with a 48-point headline, checking the statements of motorman and conductor against the story printed in *The Morning Sentinel* and apparently finding them all inflammable. His rugged face flushed scarlet.

The Sentinel was crusading against grade-crossing accidents, especially on the Pacific Electric. It blamed every such mishap on the interurban company, whose double-track lines covered the territory adjacent to Los Angeles with a steel web.

Despite the warning wigwag signals and bells at all grade crossings, and the deftness with which motormen handled the air, motorists persisted in driving onto intersections in the face of oncoming electric cars, and being struck. The big steel interurban cars were well nigh indestructible but the gas buggies weren't.

The Sentinel's vindictive attitude could be traced to Doris Malden, the spoiled granddaughter of its aging publisher. Doris had tried, in her shiny new Cadillac, to beat a Pacific Electric train through a crossing. It turned out a dead heat. If the motorman hadn't been alert and cool, the collision might have been tragic. As it was, her Cadillac had been wrapped around the stubby front end of the electric car.

Doris was unhurt but highly incensed and, of course, she blamed the interurban. Her crochety old grandpa then launched a crusade against the Pacific Electric. Every time one of its big red cars locked fenders with an automobile, *The Sentinel* screamed of the "Red Reaper." During that period the PE's op-

What went wrong for the kid who loved to draw?



SOMEWHERE in this country — it really doesn't matter where — lived a kid who loved to draw. His name doesn't matter much either. *It might even be you.*

Anyway, this kid spent hour after hour sketching... painting... making pictures. He drew anyone who would hold still, anything he saw. And—for a kid of his age—what he did was good.

By the time he finished high school, he was sure that what he wanted most was an art career. But then something went wrong.

Maybe it was lack of money. Maybe it was a too-early marriage. But it meant getting a job—any job—fast. And his dream of an art career went out the window.

A Second Chance For The Sidetracked

It seems there are lots of ex-kids like this around, talented people who got sidetracked into dead-end jobs because something went wrong. We at the Famous Artists Schools know because we've helped so many of them to a "second chance" at the good life and the good money that an art career offers. In fact, it was just such people who gave Albert Dorne, one of the greatest moneymakers in commercial art, the idea of founding the Famous Artists Schools. Dorne had often received letters saying, "I'd like to be in art, but I have responsibilities. I'm stuck at home. How can I learn?" Or—"I love to draw. Please look at my drawings. Do I have any talent? What can I do about it?"

Dorne consulted Norman Rockwell, America's best-loved artist, and Jon Whitcomb, famous for his paintings of beautiful girls. He found they too were always getting letters asking for advice and help. So one day, over ten years ago, he gathered America's twelve most famous artists in his studio. Dorne pointed out that thousands of men and women wanted to become artists... but, for one reason or another, they could not leave their homes or their jobs to study art. He noted how many trained artists were needed all over the country. "Why can't we," asked Dorne, "devise a way to bring practical and professional art training to any of these people with talent... no matter where they live or how little spare time they have?"

The famous artists agreed. Taking time from their busy careers, they pooled their knowledge to perfect a revolutionary new way to teach drawing and painting. They made over 5,000 drawings especially for the

School's home study lessons. They demonstrated in words and pictures the priceless trade secrets and techniques they had learned through their own successful careers.

Person-To-Person Instruction By Mail

Finally, out of this rich experience, they worked out a brilliant new way to correct a student's work. Their system is perhaps the most personal and the most helpful method of teaching the art field has ever known.

For each drawing the student mails in, the instructor draws or paints in detail, on a separate sheet, his suggestions for improving the student's picture. Along with the revisions the student receives a long personal letter of further criticism and advice. There can be no misunderstanding—and the student has a permanent record of his progress to refer to as often as he likes.

Thus was born the Famous Artists Schools, whose campus is the U. S. Mail, whose classrooms are the students' own homes, and whose faculty is the most fabulous ever assembled. How well has it worked—especially for people like the kid who loved to draw?

Students Quickly Succeeded

Stanley Bowen, a father of three, was trapped in a dull, low-paying job. By studying with us, he was able to throw over his old job to become an illustrator for a fast-growing art studio... at a fat increase in pay!

Don Golemba of Detroit stepped up from railroad worker to the styling department of a major automobile company. Now he helps design new car models.

Mrs. Gillian Evans, of Montreal, searching for a part-time career to combine with home-

making and raising a young son, decided upon an art career. She now specializes in children's portraits in oil and pastel, and occasional pen and ink illustrations of babies.

John Busketta was a pipefitter's helper in a gas company. He still works for the same company but now he's an artist in the advertising department at a big increase in pay.

Bob Cleveland of Indianapolis shined shoes, sold papers, was working in a routine drafting job when he enrolled with us. Now he earns \$200 a week as a free-lance artist and has his own commercial art studio.

Send For Famous Artists Talent Test

To discover people with talent worth developing, the twelve famous artists created a remarkable, revealing 12-page Talent Test. The School now offers this test free and grades it for you free. Men and women who reveal natural talent are eligible for training by the School.

Would you like to know if you have valuable hidden art talent? Simply mail the coupon. Our Famous Artists Talent Test will be sent to you at once. It may start you on the road to becoming a somebody in art... instead of just a guy in a job, who once was a kid who loved to draw.

America's 12 Most Famous Artists

Norman Rockwell
Jon Whitcomb
Al Parker
Stevan Dohanos
Doug Kingman
Peter Helck
Fred Ludkens
Ben Stahl
Robert Fawcett
Austin Briggs
Harold Von Schmidt
Albert Dorne

FAMOUS ARTISTS SCHOOLS

Studio 392, Westport, Conn.

I would like to find out if I have art talent worth developing. Please send me—without obligation—your Famous Artists Talent Test.

Mr. _____ Age _____
Mrs. _____
Miss _____
Address _____
City _____ Zone _____
County _____ State _____

erating officials were hard to get along with.

MR. DONALDSON was muttering, half to himself: "We slow down our cars to twenty miles an hour at road crossings, which cuts our running time a lot. But when we're not smacking into automobiles they are ramming us from the side."

Then he spoke directly to Eddie.

"There has been some criticism of your handling of the flood situation at Whittier. They claim you were extravagant. But I don't think so. You did a great job."

While he was talking, the door opened and Trainmaster Burton came in heavily.

"Well, I don't think he did," Burton cut in harshly. "Mr. Sand exceeded his authority as relief agent by instituting that shuttle service without permission when he knew it wouldn't bring in enough revenue to pay the cost of operation."

The trainmaster pushed his hard hat to the back of his head with a clam-shovel hand.

"Sure," said Eddie. "All I did was to keep the commuters and mail coming and going, which, as I understand it, is the main function of this company."

Burton had been transferred to the PE from the parent company's steam lines, but nobody yet had any idea why. Two wild guesses were current: One, that the parent line had been stuck with Burton and had shoved him on to its subsidiary on the theory that he might do less harm in a smaller field. The other conjecture was that he'd been sent furtively to study men and operations, and to report his findings.

As Eddie sized up the situation, O. J. Donaldson was in a spot. The super stood a chance of having his throat cut, so to speak, without means of defense or retaliation. It was plain that a feud was developing between the two officials, and the affair at Whittier had only inflamed it.

Eddie sensed that Burton was sore because he hadn't been consulted about the shuttle service. But however good the boomer's intention,

with the flood rising, the need for quick action had become so great that it did not permit delay. You had to move at once, or let it ride.

Mr. Donaldson said: "I haven't seen any figures from the auditor's office to show we went into the red."

"I don't have to see them to know they are bad," Burton replied. "I can tell operating costs without an auditor."

"Besides," said the super, "we kept the business from going to competitors."

Burton spoke sharply: "Well, Eddie, I don't suppose I'll be seeing you around. Good luck!" And he marched off with a heavy tread.

Eddie stiffened. So the T.M. was trying to run him out! "I don't remember ever being fired like that before," he snapped.

"When there's any firing done in this office," Mr. Donaldson said grimly, "I'll do it." He glanced at a memo pad. "You being a telegraph operator, I suppose you have worked an interlocking tower?"

Eddie said he'd worked all kinds and sizes of towers, from a manual of four switches with a semaphore to a ninety-lever plant.

Mr. Donaldson went on: "Our electrical superintendent needs a tower man right away at Watts. Suppose you go up and see him. I've told him about you."

Eddie ran lean freckled fingers through his red hair while he thought of Walley's letter. This wasn't going to pan out as he had hoped. "Doesn't Mr. Burton ever visit the towers?" he asked.

"Certainly. He often springs tests on the trainmen from them. And the operator on duty has to cooperate."

"Well, then, he's sure to find me working at the Watts tower, and when he does he'll throw me out and maybe make it tough on you."

But Eddie knew at once he'd made the wrong remark. The Old Man's eyes glinted. "Which comes under the head of *my* affair," he growled.

Eddie's resentment against the trainmaster burned. Burton should have his ears knocked down. Eddie told himself that maybe, just maybe, he was the man to do it. Walley's

letter faded. The careless road seemed far away.

"I'd like that job," he said.

Mr. Donaldson looked up again from the trainman's report. "You can tell the boys down there at Watts that if they are involved in any more crossing accidents they had better bring the company jewelry with them, ready to turn in, when they come to see me."

WATTS tower stood conspicuously on Main Street, a block from the passenger station. Eddie considered the layout from the high, glass-in upper story of the slim structure. There was a complicated web of tracks and sidings over which you had to maneuver the swift flow of electric trains with a bank of levers protruding like pistol butts in rows from the interlocking machine.

Four tracks came down from Los Angeles, the inside two carrying the fast main-line traffic. The two outer lines were used for locals and freights. They ended here in a car barn beyond the tower, while the double-track main line continued southward to branch and fan out to San Pedro, to Long Beach, and to Newport. A double-track swerved sharply east to Santa Ana, while the Redondo route turned west beyond the barn.

On these lines, from all directions, the trains poured through the interlocking plant. There were fast interurbans with their loads of commuters and tourists, the slower locals, and plodding freights with huge juice hogs.

Dave Martin, the first-trick operator, paced the bank of levers thoughtfully, pulling them out in series and then, as the train cleared, pushing them back to normal. Lights glowed and died in the numbered and frosted glass of the approach indicators. Enunciators clucked harshly. Whistles called from far away as trains rolled down upon the distant signals on their high bridges. Gongs banged near at hand as motormen warned the heavy motor traffic at the highway crossing a block away.

Martin didn't glance at the tracks

WILL YOU SPEND \$2 TO SAVE YOUR HAIR?

How many hard-earned dollars have you spent to save your hair? How many hair tonics, gadgets, restorers, electrical devices, have you tried in the last few years—with no success? How many times after an unsuccessful hair-growing attempt have you sworn not to spend another cent on another hair treatment?

Yet, you buy the next product that comes on the market with hair-growing claims.

Stand in front of a mirror, take a long hard look at the top of your head. What have you to show for the money you spent on hair restorers? Do you have as much hair as one year ago? Do you see any signs of new hair, or new hair growth? Why the failure?

CAN YOU GROW HAIR?

Doctors who have spent a lifetime studying hair and hair growth have concluded that nothing now known can grow hair on a bald head. So, if you are bald, prepare to spend the rest of your life that way. Accept it philosophically and quit spending hard-earned dollars on hair growers.

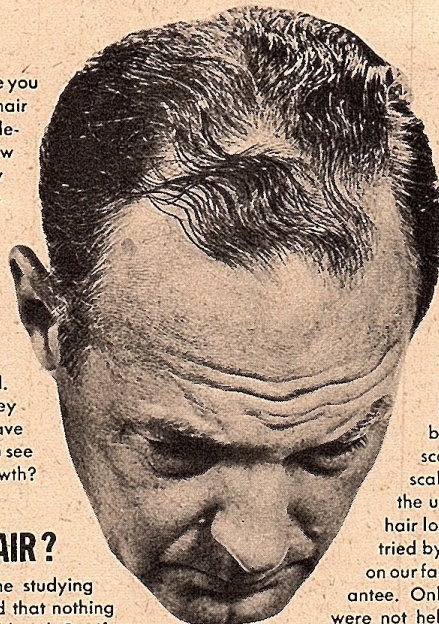
If you can't grow hair—what can you do? Can you stop excessive hair loss? Can you save the hair you still have? Can you increase the life expectancy of your hair? Probably. Please read every word in the rest of this statement carefully, since it may mean the difference to you between saving your hair and losing the rest of it to eventual BALDNESS.

HOW TO SAVE YOUR HAIR

Itchy scalp, hair loss, dandruff, very dry or oily scalp, are symptoms of the scalp disease called seborrhea. These scalp symptoms are often warnings of approaching baldness. Not every case of seborrhea results in baldness, but doctors now know that men and women who have this scalp disease usually lose their hair.

Seborrhea is believed caused by three parasitic germ organisms (staphylococcus albus, pityrosporum ovale, microbacillus). These germs first infect the sebaceous glands and later spread to the hair follicles. The hair follicles atrophy, no longer can produce new hairs. The result is "thinning" hair and baldness.

Many men and women suffer needless worry and heartache as they peer into the mirror at their retreating hairlines. Worse, they suffer needless loss of hair because today seborrhea can be controlled—quickly and effectively—by treating



your scalp with the amazing scalp medicine called Ward's Formula.

DOUBLE MONEY BACK GUARANTEE

In seconds, Ward's Formula kills the three parasitic germ organisms retarding normal hair growth. This swift germicidal action has been proven in scientific tests by a world-famous testing laboratory (copy of laboratory report sent on request). Ward's removes infectious dandruff, stops scalp itch, brings hair-nourishing blood to the scalp, tends to normalize very dry or oily scalp. In brief Ward's Formula corrects the ugly symptoms of seborrhea, stops the hair loss it causes. Ward's Formula has been tried by more than 350,000 men and women on our famous Double-Your-Money-Back Guarantee. Only 1.9% of these men and women were not helped by Ward's and asked for their double refund. This is truly an amazing performance.

Why not join the men and women who have successfully ended their troubles? Treat your scalp with Ward's Formula. Try it at our risk. In only 10 days you must see and feel the marked improvement in your scalp and hair. Your dandruff must be gone. Your scalp itch must stop. Your hair must look thicker, more attractive, and alive. Your excessive hair loss must stop. You must be completely satisfied—in only 10 days—with the improved condition of your scalp and hair, or simply return the unused portion for Double Your Money Back. So why delay? Delay may cost your hair.

H. H. Ward & Co., Inc.
19 West 44 Street, New York 36, N. Y.

©1959

Doctors and hospitals can obtain professional samples of Ward's Formula on written request.

H. H. WARD & CO. INC. Dept. 3409B
19 West 44 Street, New York 36, N. Y.

Rush Ward's Formula to me at once. I must be completely satisfied in only 10 days or you GUARANTEE refund of DOUBLE MY MONEY BACK upon return of bottle and unused portion.

Name

Address

City

..... Zone State

☐ Enclosed find \$2, send postpaid (check, cash, money order)

☐ Send C.O.D. I will pay postman \$2 plus postal charges.

Canada, foreign, APO, FPO, add 50¢—No C.O.D.

DOUBLE MONEY BACK GUARANTEE

while he piloted the trains through the busy labyrinth. He got the picture from the glowing indicators and the guttural call of enunciators. He threw the switches and set the signals as if by telepathy. He was amiable and deliberate.

"How many trains a day run through this plant?" Eddie inquired.

"About five hundred and fifty every twenty-four hours," Martin said.

"That's hot traffic. How come I get the second trick when I'm new man? Doesn't the third-trick man want to be set up?"

Martin swung a twenty-car freight train from the outside track to the main line and headed it for the port. Then he spoke.

"It interferes with his fishing."

Tim McQuiston, the maintainer, climbed the stairs and thrust his rosy face in at the doorway.

Eddie said: "First you'd better show me the layout. I'd like to know the location of all those switches and signals before I begin operating them."

The two men went out into the sunlight, among the rolling trains. They plodded through the plant from the farthest distant signals, away out of sight of the tower on the curve of the Santa Ana and Redondo lines.

They checked over all switches and their motors. Also the batteries, set up in the lower floor of the tower, which generated the DC juice that actuated signals and switches. Then they went over the AC lines which furnished the energy for lights and rail circuits.

Tim kept the plant in fine shape and was proud to show it. Eddie had the picture complete by the time they returned to the tower.

BY NOW, Eddie had the feel of this juice line. At first, after years on steam roads, operations on the Pacific had sounded slightly tinny and the whine of the motors hadn't seemed as substantial as the blast of the stacks. But there was power in the current. And those long red trains could ramble.

Close-strung, they rolled down the

main from Los Angeles, single cars and multiple trains, wheeling through to the beaches and the port. Redondo and Santa Ana trains swung right and left. Catalina specials added themselves to the unending stream, morning and evening.

Inbound to Los Angeles, the locals cut across the main line to the outside track. The outbounds turned into the barn around a corner of the tower on their twenty-minute schedules.

Freight trains, twenty loads to each electric locomotive, rumbled by with cargoes from the ships at San Pedro. Strings of empty tank cars cut over to the Redondo, bound for the refinery at El Segundo, and returned full of oil. Mixed trains, mostly empty refrigerators, turned toward Santa Ana in the early morning and came back in the evening with citrus fruits for steam-road connections to the Eastern markets.

It was the job of operators in the high tower to move all this traffic through the plant in its proper channel. Musing on this, Eddie decided that the electric railway had agreeable qualities.

In an afternoon lull before the evening peak began, his brooding was interrupted by heavy steps on the outstairs and Trainmaster Burton heaved himself through the doorway.

"A good day to you," said Eddie.

Burton frowned darkly. "I thought you were out of service."

"No, sir," Eddie said politely.

"I guess I didn't follow that through, as I should," Burton mumbled. "I'll have to go back and find out what happened." He took out his notebook, unhooked his watch, and laid them both on the interlocking machine. "I'm down here to make tests on the train men."

He squinted north along the four tracks. While his back was turned, Eddie took a drink of water at the cooler and opened two more windows.

"A little warm this afternoon, Mr. Burton. Did you notice how the section gang has cleaned up around the barn? I think the foreman said you missed that in the last time you were

looking things over out here."

Burton grunted, and moved to the other side of the tower and peered toward the barn. With the interlocking machine between them, Eddie rumaged swiftly among the lanterns and signal flags. Then he leaned out of the window and sniffed the air.

Burton said, "It doesn't look much different to me," and turned back. "Is that a Long Beach train whistling for the board? Stop him at the home signal, and let's see how fast the conductor falls off and how far he goes back to flag."

"Okay," Eddie agreed.

The car stopped at the signal bridge. The motorman whistled one long and three short blasts, calling on his conductor to get out and go back and protect the rear of his train against following traffic.

Immediately the conductor dropped from the back step with his can of signals looped over his shoulder and proceeded briskly to the rear.

"Very prompt," Eddie murmured. "I'd say he is on his toes."

Burton chewed a toothpick. "All right, let him through."

Eddie Sand dropped the board, and the motorman whistled in his flag.

FOR two hours thereafter, Burton had Eddie stop outbound trains at the home board in his effort to trap the conductors. He continued this pursuit doggedly into the first of the evening homeward rush of commuters, and traffic began to snarl, while Eddie showed alacrity in holding the board on any designated train.

But he didn't catch a culprit. The longest time any conductor took to unload from the rear end of his train was eighteen seconds by Burton's own watch. That wasn't reprehensible. At last the trainmaster reluctantly closed his virgin notebook and hooked up his watch to its heavy gold chain.

"The law of averages should have stuck at least one of all those cars we stopped," he grumbled. "There's something wrong here."

He stared at Eddie. Then he de-

parted, muttering, and the tower shuddered to his tread as he descended the outside stairs.

The boomer darted to the open window and snatched a checkered flag from where he had hung it by two nails against the outside wall just below the ledge. He rolled it and concealed it among the other signal flags.

This was a piece of advertising display which Eddie had begged from a service station. He had then passed the word quietly at all terminals on that end of the division that when the checkered flag was shown on the side of his tower it indicated that a trainmaster was in observation.

Eddie returned to his bank of levers. He threw the switches and set the signals that put the congested flow of trains swinging freely through the plant again.

The dispatcher's telephone rang. Eddie answered, his eye on the approach indicators.

"This is Donaldson," a muffled

voice came through the transmitter. "Is Burton there?"

"Why, no," said Eddie. "He just left."

"I thought so," said O.J. "I'm over here at the Watts station, observing the fine co-operation you gave my trainmaster making those tests. What would you have done if he had made some tests on inbound trains?"

Eddie glanced at the Watts station across the four tracks. "Well," he deliberated.

"On second thought," said O.J., "I guess I'd better not know too much about this."

He hung up. So did Eddie, thoughtfully. The Old Man was acute. Evidently he made a point of knowing what was going on.

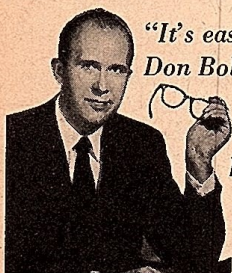
The boomer turned a Redondo two-car train from the main line and watched it swing from sight beyond the barn. Trainmaster Burton was headed across the sidings below, to board the next local and go back to Sixth and Main.

Two men had just crowded themselves into a Chevrolet parked on the narrow street beside the barn. They stared at Burton while they talked to each other. Then they got out, walked across the switches, and intercepted the trainmaster.

Burton nodded to their greeting and their questions. He led them toward the main line and pointed to the crossing, now jammed with two lanes of automobiles and trucks, moving slowly at the height of the evening congestion. Electric trains passing through these lanes interrupted the highway traffic.

One of the two was short and burly and carried a large camera hung to his person. The other, thin and lantern-jawed, was bent slightly in the middle as he leaned close, intent on what the trainmaster was saying.

It was pretty obvious to Eddie, as it should have been to the trainmaster, that the two strangers were newspaper men from *The Morning Senti-*



"It's easy," says
Don Bolander . . .
"and you
don't
have to go
back to
school!"

During a recent interview, Don Bolander, director of Career Institute of Chicago and a leading authority on adult education, said, "You don't have to go back to school in order to speak and write like a college graduate. You can gain the ability quickly and easily in the privacy of your own home through the Career Institute Method." In his answers to the following questions, Bolander tells how.

Question: *What is so important about a person's ability to speak and write?*

Answer: People judge you by the way you speak and write. Poor English weakens your self-confidence—handicaps you in your dealings with other people. Good English is absolutely necessary for getting ahead. You can't win the respect and confidence of other persons without a sure command of good English.

Question: *What do you mean by a "command of English?"*

Answer: A command of English means you can express yourself clearly and easily without fear of embarrassment. It means you can write well, carry on a good conversa-

HOW TO SPEAK AND WRITE LIKE A COLLEGE GRADUATE

tion—also read rapidly and remember what you read. Good English can help you throw off self-doubts that may be holding you back.

Question: *But isn't it necessary for a person to go to school in order to gain a command of good English?*

Answer: No, not any more. You can gain the ability to speak and write like a college graduate right in your own home—in only a few minutes each day.

Question: *Is this something new?*

Answer: Career Institute of Chicago has been helping people for many years. The Career Institute Method quickly shows you how to stop making embarrassing mistakes, enlarge your vocabulary, develop your writing ability, discover the "secrets" of interesting conversation.

Question: *Does it really work?*

Answer: Yes, beyond question. In my files there are thousands of letters, case histories and testimonials from people who have used the Career Institute Method to achieve amazing success in business and social lives.

Question: *Who are some of these people?*

Answer: Almost anyone you can think of. The Career Institute Method is used by men and women of all ages. Some have attended college, others high school, and others only grade school. The method is used by business men and women, typists

and secretaries, teachers, industrial workers, clerks, ministers, and public speakers, housewives, sales people, accountants, writers, foreign-born citizens, government and military personnel, and many others.

Question: *How long does it take for a person to gain the ability to speak and write like a college graduate, using the Career Institute Method?*

Answer: In some cases people take only a few weeks to gain a command of good English. Others take longer. It is up to you to set your own pace. In as little time as 15 minutes a day, you will see quick results.

Question: *How may a person find out more about the Career Institute Method?*

Answer: I will gladly mail a free 32-page booklet to anyone who is interested.

If you would like a free copy of the 32-page booklet, "How to Gain a Command of Good English," just fill out and send the coupon below.

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nel seeking lurid news and pictures of the "Red Reaper."

Likely enough, Mr. Burton was telling them that this was one of the busiest highway crossings on the system, a vulnerable spot. Possibly he was giving them the profound opinion of an operating official as to the hazards involved, in which case he'd probably read these convictions printed boldly in next morning's *Sentinel*.

Superintendent Donaldson should be told about this, pronto. Eddie grasped the crank of the wall telephone to grind out a call. Then some detail in the milling scene below caught his eye and he paused. The boomer had developed a faculty for hunches through years of handling fast schedules.

An inbound three-car San Pedro train was cruising toward the intersection. The motorman had sounded his crossing whistle and was now clanging his gong. Wigwag signals waved their warning. Motor traffic had paused on either side of the tracks to let the train through. The crossing was clear as it approached, and the motorman gave the controller another notch.

Then Eddie's eyes focused on an aimless item of chance. A little old man in an ancient Ford along the line of waiting automobiles on the west side of the crossing. He seemed to be gripping the steering wheel with firm determination. The line of waiting automobiles, the wigwag swaying its warning in his face, the train's whistle and clanging gong—apparently none of these had penetrated his deep concentration. He drove the shabby vehicle forward as if oblivious of the passing scene. A crash was inevitable.

Idling motors of the waiting line of automobile died to whispers. A Watts Local paused beside the tower and the motorman tapped a request on his gong to be let into the barn. A Santa Ana inbound called from its obscure distant signal.

Serenely the old man drove his tinlizzie onto the four tracks. A motorman glimpsed the Ford and shoved the brake-valve handle all the way around. There was a sharp explo-

sion of compressed air. Brake-shoes slammed.

The long steel car nudged the little Ford with clumsy disapproval, breaking it up like a frail chicken coop. Pieces washed over the head end, cascaded down the bumper, and were caught on the tripped fender. The train stopped with a shudder. But nobody was hurt, not even the old man.

THE claim agent had Eddie up to his office next morning for detailed questioning. On his way out, Eddie stopped in to see Mr. Donaldson.

When Eddie barged in the superintendent asked, "See *The Sentinel*?"

The tower man winced as O.J. spread the paper out before him. He'd already seen it. Beneath the front-page banner line, "The Red Reaper Strikes Again," were several pictures taken at the scene of the crossing accident, and among them a shot of Eddie himself leaning from the tower window.

Mr. Donaldson's eyes glinted with annoyance. "Good likenesses of you and Burton," he said.

"Yeah," Eddie nodded. "Mr. Burton practically handed the newspaper those pictures and the eyewitness story. The two men from *The Sentinel* were prowling around the spot and were about to leave in their Chevy when Burton went down the tower stairs. I saw they got out of their car again and head him off. He showed them around and likely gave them the lowdown on crossing hazards."

"You mean Burton was taking two men from *The Sentinel* on a personally conducted tour of the interlocking plant?"

"He was," Eddie nodded. "I couldn't hear his words, of course, but I saw him walking around with those men and pointing to the installations."

Mr. Donaldson shook his head. "It hardly seems possible that a trainmaster could be so dumb."

Story coming in our next issue (Dec., out Oct. 1) will follow up this incident and will answer the question: How much longer will Eddie Sand, steamroad boomer, continue to work for Pacific Electric?

WHEEL ARRANGEMENTS (Steam, Diesel, Electric)

by SY REICH

TO IDENTIFY the many types of steam locomotives that roamed the rails in his day, Frederic M. Whyte devised an ingenious classification system based on the number and location of their wheels, and this system has been in standard use by motive power men in the English-speaking world for well over half a century. But not much is known about Mr. Whyte himself.

We do know that he first saw the light of day in New York State on March 1, 1865, just as the Civil War was ending, and grew up in a lusty period of national expansion. Pioneers pushed westward; thousands of miles of rail were being laid. The brass-trimmed Eight-wheeler trailing an evanescent smoke plume was then the swiftest form of transportation known to man, and the depot where you boarded the steam cars was the social center of town.

With such a background and being mechanically gifted, the youth naturally

turned to railroading for his life work, in 1889, when Cornell University gave him a sheepskin. Frederic began as a motive power draftsman for the Lake Shore & Michigan Southern. Later he worked for the Baltimore & Ohio, the Mexican Central, two Chicago el's, and other roads, his last railroad job being general mechanical engineer for the Rutland, then part of the New York Central system, from which he resigned in 1910.

Whyte divided locomotive wheels into three categories: those of the pony or leading truck, the drivers, and those on the booster or trailing truck, usually under the cab. Pony and trailing-truck wheels, as a rule, are smaller than the drivers. However, the Whyte system does not indicate the presence or absence of a booster, which is a small reciprocating steam engine fastened to the trailing-truck wheels and supplying extra power for starts.

A Ten-wheeler, for example, with its four-wheel pony truck, its six driving wheels, and no trailing truck, is a 4-6-0. An Articulated Consolidation, such as those in the Southern Pacific's AC Class, is a 4-8-8-2. It has a four-wheel pony truck, two articulated frames each with eight drivers, and a two-wheel trailing truck.

Unofficially, "C" following a notation indicates a Camelback, and "T" a tank locomotive. The Brooklyn Eastern District Terminal's switchers, the last active steam power left in New York City, are 0-6-OT's.

THE FRENCH do not use the Whyte classification. Their system is based on the number of axles. Thus a Pacific is a 2-3-1, a Mikado a 1-4-1, and so on. Originally the German system was somewhat like that of the French, but consisted of two numbers separated by a diagonal line. The first number told how

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EXAMPLE	A A R	CONTINL.	
PRR A-6	B	Bo	$\angle \textcircled{0} \textcircled{0} \backslash$
PRR B-1	C	Co	$\angle \textcircled{0} \textcircled{0} \textcircled{0} \backslash$
NYNH&H EY-2A	B+B	Bo+Bo	$\angle \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \backslash$
EMD GP-9A	B-B	Bo-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
GE 45 TON	B-B	B-B	$\angle \textcircled{1} \textcircled{0} - \textcircled{0} \textcircled{1} \backslash$
EMD SD-9	C-C	Co-Co	$\angle \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \textcircled{0} \backslash$
NYC R-2	C+C	Co+Co	$\angle \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} \backslash$
EMD E-9A	AIA-AIA	AIA-AIA	$\angle \textcircled{0} \textcircled{1} \textcircled{0} - \textcircled{0} \textcircled{1} \textcircled{0} \backslash$
FM CPA 20-5	B-AIA	Bo-AIA	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{1} \textcircled{0} \backslash$
EMD LWT-12	B-1	Bo-1	$\angle \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
FM PI2-42	B-2	Bo-2	$\angle \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
GN Z-1	1-D-1	1-Do-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
PRR L-5	1-D-1	1-BB-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
PRR P-5	2-C-2	2-Co-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
PRR P-5B	B-C-B	Bo-Co-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
NYC S-1	2-D-2	2-Do-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
VGN GE'S	B+B+B	Bo+Bo+Bo	$\angle \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \backslash$
NYNH&H EF-1	1-B+B-1	1-Bo+Bo-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
NYNH&H EP-1	1-B-B-1	1-Bo-Bo-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
PRR FF-2	1-C+C-1	1-Co+Co-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
PRR FF-1	1-C+C-1	1-C+Co-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
NYNH&H 069	1-D-1	1-ABCo-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
NYNH&H EP-2	1-C+1+1-C-1	1-Co+1+Co-1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} + \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
NYC R	B-B-B-B	Bo-Bo-Bo-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
NYC T-1A	B-B+B-B	Bo-Bo+Bo-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
GN W-1	B-D+B-B	Bo-Do+Bo-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
MILW WH'S	2-C+1+1-C-2	2-Co+1+Co-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} + \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
PRR GG-1	2-C+C-2	2-Co+Co-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
PRR E-3B	B-B-B	Bo-Bo-Bo	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
MILW BI-POLAR	1-B+D+D+1	1-Bo+Do+Do+1	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
BW DR12-8-3000	2-D+D-2	2-Do+Do-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
EMD TR-2	(B-B)X(B-B)	(Bo-Bo)X(Bo-Bo)	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
NYNH&H 070	(1-B)X(1-B)	2(1-B)	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
PRR DD-1	(2-B)X(2-B)	2(2-B)	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
CNR Z-2	(C)X(C)	2(Co)	$\angle \textcircled{0} \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} \textcircled{0} \backslash$
N&W	(1-D)X(1-D)	2(1-BB-1)	$\angle \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \times \textcircled{1} - \textcircled{0} \textcircled{0} \textcircled{0} \textcircled{0} - \textcircled{1} \backslash$
MILW E-22	(2-D+D)X(2-D+D)	2(2-Bo+Bo)	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
EMD TR-3	(B-B)X(B-B)X(B-B)	3(Bo-Bo)	$\angle \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \times \textcircled{0} \textcircled{0} - \textcircled{0} \textcircled{0} \backslash$
MILW FRTS	(2-B+D)X(2-B+D)	2(2-Bo+Do)	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \backslash$
			$\textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
MILW FRTS	(2-B+D)X(2-B+D)X(2-B+D)	3(2-Bo+Do)	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} + \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} \backslash$
			$+ \textcircled{0} \textcircled{0} + \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$
PRR O-1	2-B-2	2-Bo-2	$\angle \textcircled{1} \textcircled{1} - \textcircled{0} \textcircled{0} - \textcircled{1} \textcircled{1} \backslash$

Standard classification by wheel arrangement for diesel and electric locomotives.

many driving axles the locomotive had; the second gave the total number of axles.

Thus in Germany the Pacific was 3/6, the Mike a 4/6, and the Consolidation a 4/5. This system has serious flaws. Many locomotives of different wheel arrangements had the same symbol. For instance, an American (Whyte 4-4-0), a Columbia (Whyte 2-4-2) and a Forney four-coupled (Whyte 0-4-6) all had the same German identification 2/4.

Later, the Germans found a method of avoiding this duplication. They improved their own system in such a way that it sidestepped the pitfalls of the Whyte and French systems as well. The new German scheme is based on the number of axles. Non-powered axles are referred to by numbers, the numeral corresponding to the number of axles. Thus 1 means one non-powered axle, 2 means two non-powered axles, etc. Powered axles (drivers) are referred to with letters. The numerical position the letter occupies in the alphabet corresponds to the number of powered axles. A means one powered axle, B means two powered axles, and so on.

These letters and numbers are combined in the same way as in the French axle classification system except that no dash is used. A Pacific would be 2C1, a Mikado 1D1, a Consolidation 1D. Plus signs were used for Beyer-Garratt types. Thus a Beyer Garratt (Whyte notation 4-6-4+4-6-4) would be a German notation 2C2+2C2. A dash is used to identify an articulation joint in a Mallet. Thus, a Southern Pacific Articulated Consolidation (Whyte 4-8-8-2) would be a German 2D-D1.

THE GERMAN system provides that in cases such as the Pennsy T-1's, where the drivers are not articulated but are driven by separated rods operated by separated cylinders, a space is left between the driver designations without any punctuation. Thus, the Pennsy's T-1's (Whyte 4-4-4-4) would be a German class 2B B2.

You can see that the German system left no ambiguities. Ordinary wheel arrangements had no punctuation, Beyer-Garratt types had plus signs, Mallets dashes, and rigid frame multi-cylinder locomotives spaces between the driving axles designations.

WHEN locomotives with electric transmissions began to appear, so few units existed that there was no trouble in identifying them by name or

RAILROAD

by railroad. But as more electrics went into service and after diesel-electrics had been introduced, there was need for an identification formula that included electric transmissions. Then, in 1932, the Association of American Railroads devised a system for classifying such locomotives, based on the number of axles.

Identification begins, as with all systems, at the front and proceeds to the rear. Letters designate axles driven by motors. One driven axle is A, two is B, three is C, four D, etc. Non-driven axles are indicated by numbers: 1 for one non-driven axle, 2 for two, and so on. Axles in the same truck frame are shown with no punctuation or space between them. Thus, for instance, a two-axle truck is B if both axles are powered, 1A or A1 if one axle is powered and the other is an idler, or 2 if both axles are non-powered.

A three-axle truck is designated C when all three axles are powered; A1A, 1B, or B1 if two axles are powered and one is non-powered; 2A, A2 or 1A1 if two axles are non-powered and one is powered, or 3 if all three axles are non-powered. The choice of A1A, 1B, or B1 to designate two powered and one non-powered axle depends on the axles' arrangement from front to rear in the truck.

A dash or minus sign indicates trucks pivoted to the same main frame but not articulated. Thus, a B-B locomotive, such as a typical diesel-electric freight unit, has two trucks, each with two axles, all axles being powered, and one in which the trucks are not articulated.

A plus sign indicates trucks or units connected by means of an articulation joint. An articulation joint is a connection between trucks or units using one pin so that the drawbar pull is exerted through the truck frame to the couplers instead of through the locomotive frame or cab structure. Articulation joints are used also to guide trucks around curves. However, joints between trucks whose sole purpose is guiding and through which no buffing stresses are transmitted, such as the GIPR 2500 hp freight locomotives, are not considered articulated and a plus sign is not used; designation is C-C.

For example, B+B designates electric switchers, such as those on the New Haven, which have two articulated trucks, each truck having two driven axles. Milwaukee Road articulated units, each unit being identical, are designated (2-B+B) + (B+B-2).

OCTOBER, 1959



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THE INTRODUCTION of articulation joints often made it necessary to mount pivot (pilot) trucks on the articulated truck frame and not on the main frame. These trucks were pivoted on the articulated frame in the same way that trucks on an ordinary diesel-electric are pivoted on the main frame. Thus a dash is used between the articulated truck and the pivot truck.

To indicate that the pivot truck is mounted on the articulated frame and not on the main frame, the articulated truck and pivot truck designation is underlined. Thus, the famous Pennsy GG-1's which have two six-wheel articulated trucks with all axles powered, plus a two-axle non-powered pivot truck mounted on the frame of the articulated truck, is designated 2-C+C-2.

The Great Northern's powerful Y-1 class electrics, which have two articulated trucks, each with four powered axles, plus a two-axle pivot truck to guide each of the articulated trucks, having powered axles and mounted on the articulated truck frame, is designated B-D+D-B.

Since it is common to operate locomotives with electric drives in multiple

unit, there are symbols to indicate whether the connection between units is by a drawbar, by an automatic MCB coupler, or by an articulation joint.

A multiplication sign indicates locomotives connected together permanently by drawbars. A drawbar is defined as a link with two pins as opposed to an articulation joint which has but one pin. Thus a cow and calf diesel-electric, each unit of which has two non-articulated two-axle trucks with all axles powered is designated (B-B)×(B-B). A three-unit locomotive as described above is (B-B)×(B-B)×(B-B).

Designations of units joined with automatic MCB couplers are separated by a division sign. Thus, an ordinary three unit F-3 diesels would have to be a (B-B)÷(B-B)÷(B-B), whereas a three-unit FT diesel of which all units are connected by drawbars and not MCB couplers would be a (B-B)×(B-B)×(B-B).

A locomotive consisting of two Pennsy GG-1 units would be (2-C+C-2)÷(2-C+C-2). A Milwaukee Road electric the units of which are coupled by articulation joints would be designated (2-B+B)+(B+B)+(B+B-2).

Using the above building blocks, it is possible to designate the wheel arrangement of any electric locomotive. But the system has some ambiguity. There is no indication whether each axle is driven by a traction motor, as on diesel-electric locomotives, or the axles are joined by connecting rods and driven by a single motor, as on the Pennsy DD-1's. No provision is made, either, for notation of cases where axles can move in a rigid truck from side to side without an articulation such as on the New Haven's ill-fated Colonial class electric.

TO AVOID these flaws, we have the Continental system of electric wheel arrangement notation which is used everywhere except in the United States. It adopts the convention that trucks on which each axle is powered separately by its own traction motor is followed by a small "o," whereas trucks on which the axles are powered by a single electric motor connected to the individual axles by side rods has no suffix.

Thus a common diesel-electric such as F, GP, and SW types is Bo-Bo, while SD types are Co-Co, and passenger diesels such as E-8's are A1A-A1A.

Neither the AAR classification nor the Continental in itself is complete or unambiguous. A system which would

combine the AAR notation with the Continental meaning of Bo-Bo versus B-B would be able to specify clearly the wheel arrangements of all electric-drive locomotives. But not even this combination would indicate which are cab units and which are boosters.

So there is no truly complete nomenclature of electric-drive wheel arrangements. Neither, to our knowledge, is there a standard system for identifying the wheel arrangement of a hydraulic-drive unit. Until one is developed, nobody can identify all wheel arrangements without confusion.

Railroad Magazine uses the Whyte notation for steam locomotives and the Association of American Railroads system for diesel-electrics and electrics.

Whyte Classification

Whyte Symbol	Wheels	Name
0-4-0	00	Four-wheel switcher
0-4-2	00 0	none
0-4-4	00 00	Forney Four-coupled
0-4-6	00 000	Forney Four-coupled
0-6-0	000	Six-wheel switcher, Bourbonnais
0-6-2	000 0	none
0-6-4	000 00	Forney Six-coupled
0-6-6	000 000	Forney Six-coupled
0-8-0	0000	Eight-wheel switcher
0-8-2	0000 0	switcher
0-10-0	00000	Ten-wheel switcher
0-10-2	00000 0	Union Switcher
2-2-0	0 0	Planet
2-2-2	0 0 0	Jenny Lind
2-4-2	0 00 0	Columbia
2-6-0	0 000	Mogul
2-6-2	0 000 0	Prairie
2-6-4	0 000 00	Adriatic

2-6-6	0 000 000	Suburban Tank
2-8-0	0 0000	Consolidation
2-8-2	0 0000 0	Mikado, MacArthur
2-8-4	0 0000 00	Berkshire, Lima
2-10-0	0 00000	Decapod
2-10-2	0 00000 0	Santa Fe, Central
2-10-4	0 00000 00	Texas, Selkirk
2-12-0	0 000000	Centipede
2-12-2	0 000000 0	Javanic
4-2-2	00 0 0	Bicycle
4-2-4	00 0 00	Dorothy
4-4-0	00 00	American
4-4-2	00 00 0	Atlantic
4-4-4	00 00 00	Reading, Jubilee, Baltimore
4-6-0	00 000	Ten-wheeler
4-6-2	00 000 0	Pacific
4-6-4	00 000 00	Baltic, Hudson, Suburban
4-6-6	00 000 000	Suburban Tank
4-8-0	00 0000	Twelve-wheeler, ex-Mastodon
4-8-2	00 0000 0	Mountain, Mohawk
4-8-4	00 0000 00	Confederation, Northern, Pocono, Greenbrier, Dixie, Daylight, Wyoming, Niagara
4-10-0	00 00000	Mastodon, Governor
4-10-2	00 00000 0	Southern Pacific, Super-Mountain, Overland
4-12-2	00 000000 0	Union Pacific
4-14-4	00 0000000 00	Soviet
0-6-6-0	000 000	none
0-8-8-0	0000 0000	Articulated switcher
2-6-6-0	0 000 000	none
2-6-6-2	0 000 000 0	none
2-6-6-4	0 000 000 00	none
2-6-6-6	0 000 000 000	Allegheny
2-8-2-2-6-4	0 0000 0 0 000 00	Duplex
2-10-2-2-6-4	0 00000 0 0 000 00	none
2-8-8-0	0 0000 0000	none
2-8-8-2	0 0000 0000 0	Yellowstone
2-8-8-4	0 0000 0000 00	Triplex
2-8-8-8-2	0 0000 0000 0000 0	Duplex
2-10-10-2	0 00000 00000 0	none
4-4-6-2	00 00 000 0	none
4-6-6-4	00 000-000 00	Challenger
4-8-8-2	00 0000 0000 0	none
4-8-8-4	00 0000 0000 00	none
6-4-4-6	000 00 00 000	Pennsy S-1
6-8-6	000 0000 000	Steam turbine (Pennsy S-2)
4-4-4-4	00 00 00 00	Non-articulated (B&O, Pennsy T-1)
4-6-4-4	00 000 00 00	Non-articulated (PRR Q)
4-4-6-4	00 00 000 00	Non-articulated (PRR Q)



Steam engine on special train ran out of coal in dieselized area which had no coaling facilities, so local residents refueled her with aid of wheelbarrows and ladders. Scene from current Technicolor movie, "It Happened to Jane" (Columbia Pictures).

MAIL CAR

(Continued from page 10)

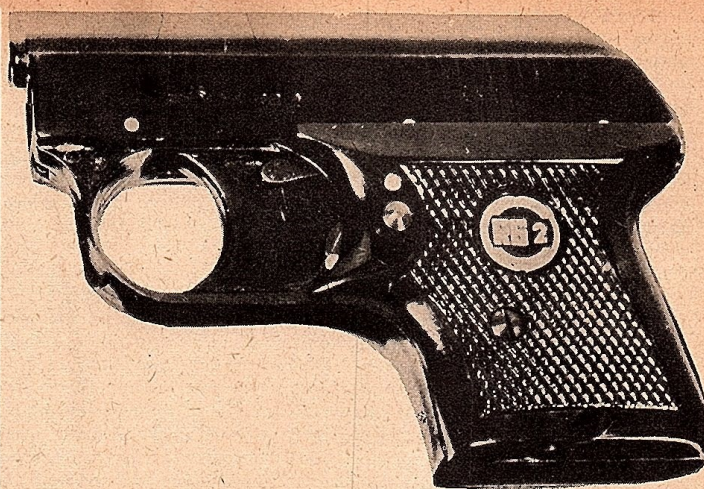
LAATEST railroad sound record, *Highball*, is a 12-inch, LP, hi-fi disk of beautiful transparent red, issued by Mobile Fidelity. It is unique in its field because it is acoustically engineered to be played only with stereophonic equipment. Adorning the jacket are eight action shots by R. H. Kindig, Gerald M. Best, and Stanley A. Snook showing steam-powered Western trains whose unforgettable sounds the record itself features, and these words, "A complete narrative sound study of the few remaining steam locomotives in operation." However, dieselization moved so swiftly after the jacket was printed that none of "the few" are running today. Jim Ameche's voice introduces each engine. Mobile Fidelity is located at 915 Hollywood Way, Burbank, California.

ODDS AND ENDS. A unique complaint was made by regular passengers on the Port Elizabeth-Uitenhage line of the South African Railroad. Normally the 7:30 a.m. train runs anywhere from 15 to 30 minutes late and the passengers have been accustomed to allowing for this delayed running time. But one morning the train was right on time, and about half of them missed it! Indignantly they protested.

Answering requests from many readers: it costs 12 cents postage to mail a copy of *Railroad Magazine* from any point in the United States to any foreign country, including those behind the Iron Curtain, or 9 cents to mail a copy between any two points in the U.S.

"Caption under photo in June issue, top of page 36, is incorrect," writes H. Seyburn Niewoehner, licensed mortician, 115½ S. 5th St., Grand Forks, N.D. "The words *undertaker* and *coffin* passed out long ago, being replaced by *mortician* and *casket*. The handles attached to the water keg shown in the picture are normally bolted to a shipping box in which the remains and casket are transported by rail or air."

Dick Murdock, the Southern Pacific hogger who wrote "Paul Bunyan's Toothpicks" (June '59 *Railroad*), has won \$25 as first prize for the slogan, "Care more—damage less," which he entered in a recent SP contest. And



The skilled hand of the German gunsmith is responsible for this .22 caliber, 6-shot repeater automatic with self-ejecting clip. Just 4" long, fits easily into pocket or purse. Ideal for sporting events, stage use (not available to Calif. residents). Comes for \$6.95 ppd. from

BEST VALUES, DEPT. K-560
403 Market St., Newark, New Jersey

Mrs. Lorraine Ritzman, wife of a clerk in the Reading's St. Clair enginehouse, won a similar contest with these words, "Accident prevention—best safety protection."

"Shortly after Seattle-Portland bus lines raised their round-trip fares to \$4.95," writes Henry R. Korman, 2640 Garfield St., Longview, Wash., "the Union Pacific, Great Northern, and Northern Pacific cut their round trip coach fare between those points from \$7.20 to \$4.95. It will be interesting to see what this does to the bus traffic."

Where was our June contents page photo taken? Hugh F. O'Neil, who works for the SP at Stockton, Calif., replies, "Stockton." Other readers say, "Tucson, Arizona."

America's railroads are only "limited members of the free enterprise system" due to Federal "strangle-holds" on their pricing system, subsidies to their competitors, and bans on their expansion into other fields of transportation, according to Joseph A. Fisher, president of the Reading.

From Wales comes news that a famous old short line, the Oystermouth & Mumbles, has shut down.

TWO new series of locomotives which, it is claimed, will save millions of dollars annually in maintenance, fuel, and other operating costs for American railroads and will haul high tonnage at higher speeds are announced by Electromotive Division of General Motors.

"We regard these series as our most important contributions to railroad progress since we brought out our wide-range freight locomotive, the F3, immediately after World War II," says Nelson C. Dezendorf, vice president of GM and general manager of E-M Div.

Four of the five are completely new models, namely: RS1325, with 1325 hp.; GP18, with 1800 hp.; and SD18, with 1800 hp., all three of them in the normally aspirated series; and GP20, with 2000 hp., turbo-charged.

The fifth, SD24, with 2400 hp., also super-charged, was announced last December. Union Pacific has ordered 75 of these diesels at a total cost above \$19 million, the first 30 of which will be delivered this summer.

The GP18, SD18, and GP20 locomotives will be available in November, while the RS1325 is scheduled to go into production next January. The RS 1325, the GP18, and the SD18 were designed to cut the required scheduled maintenance by as much as 60 percent and to effect improvement in fuel economy, increased reliability on the road, and extended life of the major components.

RS1325, a road-switcher powered by a 12-cylinder 567D1 engine, has a silhouette longer than, but similar to, the General Motors SW1200 switcher, with a short hood behind the cab to accommodate a steam generator for train heating. The two new turbo-charged models were designed for higher capacity and higher speed due to hp. increase, also for lessened fuel consumption, and as an engine that does not derate over a wide range of altitudes. •

AN EXCITING MOMENT." At age 17 I was hauling lumber from my father's sawmill in Georgia," recalls L. E. Hudson, retired Louisville & Nashville electrical department worker, 712 9th St., Etowah, Tenn. "The tracks were in a deep cut, and the dirt road on which I was driving a mule team went down into it, crossed the rails, and came out on the other side.

"Imagine my terror one day when the mules found the load too heavy to pull off the track. They just couldn't budge. From the distance came a locomotive whistle. But I prayed. Then I took off part of the load and finally succeeded in driving the wagon clear of the track. Just as I did so an express to New Orleans roared by, and I thanked the Lord for my deliverance." •

THIS poem, "That Old Gang of Mine," was written by D&RGW veterans at Alamosa, Colo., for the Rio Grande *Green Light*:

Not a soul down at the depot
That's a pretty certain sign,
The Retirement Board is breaking up
That old gang of mine.

All the boys have gone a fishin'
They've forgot the narrow gage line.
The Retirement Board is breaking up
That old gang of mine.

There goes Frank, there goes George
Down Retirement Lane;
Now and then, we meet again
But they'll all be the same.

Gee, I get a lonesome feeling
When I hear the engines whine;
The Retirement Board is breaking up
That old gang of mine.

WHAT'S WRECKING THE RAILROADS? This title was used in a series of articles written by Ted Schafers and Louis M. Kohlmeier for the *St. Louis Globe-Democrat*. The authors point out that railroad employment has dropped to half of the 1926-'30 average, many roads are operating with heavy deficits, and 33 of them could be plunged into bankruptcy unless effective action is taken.

"While railroad jobs and solvency are of special concern to St. Louis as the nation's second largest transportation center," comments Richard H. Amberg, publisher of the *Globe-Democrat*, in an open letter to President Eisenhower, "they are also of enormous importance not only to the employees, management, and stockholders of the railroads but to all citizens, since everyone would be affected by the impending rail calamity."

The articles, which have attracted nation-wide attention, trace the rail-

roads' decline to two major sources:

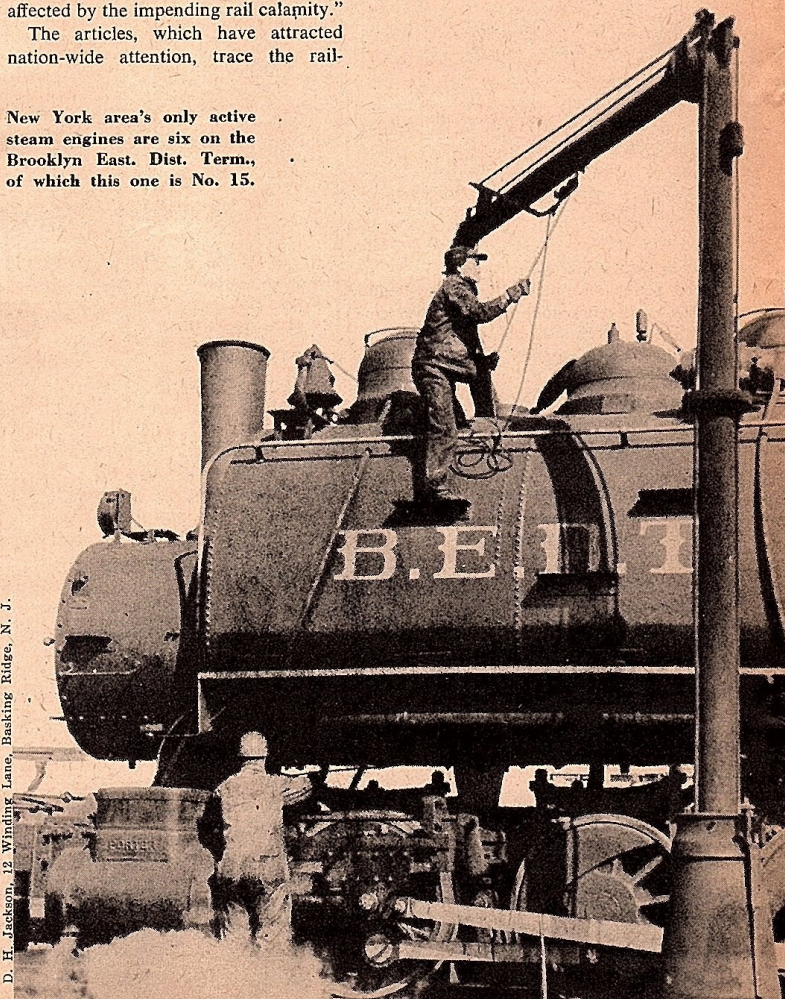
(1) Restrictive governmental legislation which fails to recognize that railroads no longer have a monopoly on the movement of people and goods.

(2) Unconscionable "featherbedding" practices by the operating unions which likewise have completely failed to keep pace with changing times and technological progress.

"To this, of course, must be added many other contributing factors such as punitive taxation," Mr. Amberg goes on, "especially compared to their competition, and management which, in many cases, has been resistant to changing circumstances."

Quoting what they call "authoritative sources," the newspaper feature writers

New York area's only active steam engines are six on the Brooklyn East. Dist. Term., of which this one is No. 15.



D. H. Jackson, 12 Winding Lane, Basking Ridge, N. J.

RAILROAD

claim that "Major 'featherbedding' labor practices are costing American railroads more than \$200 million annually."

The *Globe-Democrat* presents a strong case. Its series is both informative and controversial. But it overlooks what to us seems an obvious fact. Even if the railroads were modernized to a reasonable degree, the American people would still do most of their traveling in private automobiles. This is unfortunately true. We say "unfortunately" because of the automobile's enormous and growing casualty list, not to mention the thousand minor and major annoyances of overcrowded highways.

Another matter which disturbs us greatly is the millions of unemployed in a time of national prosperity. Every technological advance, every effort to reduce "featherbedding," however laudable such efforts may be, abolishes more jobs than it creates.

Some 30,000 men have been dropped from Canadian National and Canadian Pacific payrolls since 1952. And the Illinois Central is cutting its operating divisions from 12 to 10, effective July 1 this year, but we don't know how men have been laid off. Not long ago the IC had 20 divisions.

Automation is a sign of progress. The railroads, like all other industries, would be better off financially if they could get more work done by even fewer employees. But how far should we go in the drive for automation?

What would happen to employment, income, buying power, and taxes if eventually we should reach the technological paradise in which all work is done by relatively few human beings with millions of push-buttons?

It's a sobering thought, but Schafers and Kohlmeier ignored it in the job they did for the *Globe-Democrat*.

OVERSEAS. R. O. James, 20 Dove-dale Ave., Kenton, Harrow, Middlesex, England, wants specifications and history of Louisville & Nashville engine 758, Boston & Maine 1540 and 3653, Southern 6877, New Haven 593, Pennsy 4909, and Bay Line 907.

Another European reader is Jerry Kucharczyk, Kosynierow Gdynskich 8a/4, Wroclaw 9, Poland. A generous American gave him a subscription to *Railroad*. Jerry, who reads and writes English, likes the magazine very much. "It's full of exciting information and pictures," he says. "I like especially H. L. Kelso's articles."

OCTOBER, 1959

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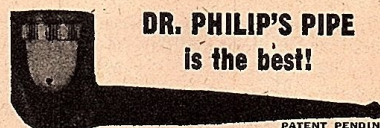


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Midland Coal Corp., not a common carrier, is the only road near Peoria where you can still see steam locomotives in action. All MEC engines came from the Minneapolis & St. Louis. They have snappy exhausts and deep-toned chime whistles, which would make fine recordings. Here is No. 82 (0-6-0) at London Mills, Illinois, en route to mine with string of empties.

Paul Stringham, P. O. Box 743, Peoria, Ill.

Shortlines of Illinois

by SY REICH

ALTON & SOUTHERN: Belt and switching railroad, 32 route-miles, area of St. Louis and East St. Louis; interchanges with all railroads serving this area.

Baltimore & Ohio Chicago Terminal: Owned by B&O, it serves as this road's major western terminus, operating the yards, engine terminals, passenger station, and connecting trackage in the Chicago area. It operates 351 miles of track, including Grand Central Station (used by B&O, C&O, and Soo Line).

Belt Railway of Chicago: Known as the "Inner Belt," it operates transfer routes between Chicago's major and minor railroads to its own yard at the city limits, called Clearing Yard. Connecting with all railroads, it operates 440 miles of track with 55 diesel-electric units.

Chicago & Illinois Midland: This 121-mile mainline between Peoria and Taylorville is an important north-south route through the state's capital. Connects with B&O, C&NW, CB&Q, CRI&P,

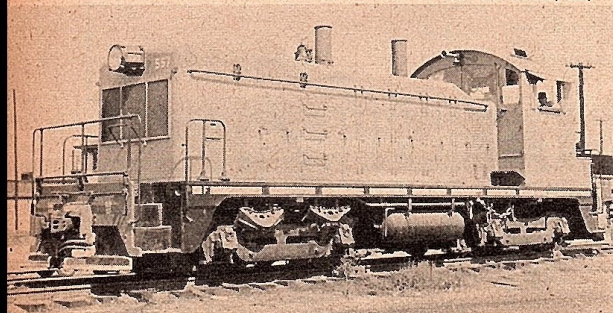
NYC, GM&O, IC, IT, M&SL, P&E, PT, PRR, TP&W, and Wabash.

Chicago & Illinois Western: Owned by the Illinois Central, it is a switching and industrial line of 11.5 route-miles along the Chicago Sanitary and Ship Canal. Connects with the Santa Fe, B&OCT, BRC, CB&Q, CB&I, IC, IN, IHM, MJ, and Pennsy.

Chicago & Western Indiana: A 27-mile main line out of Chicago, including Dearborn Station and connecting track. Dearborn Station is used by the Santa

Sy Reich, 92 St. Marks Pl., New York City

Term, RR. Asso. of St. Louis No. 557 at East St. Louis, Ill.



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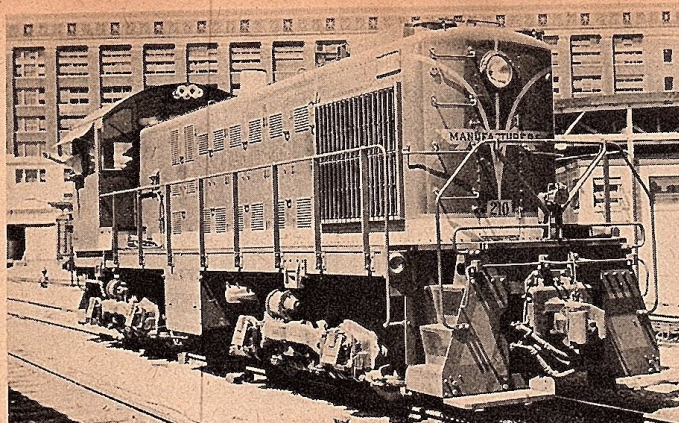
Paul Stringham

Illinois Midland 4 (0-4-0T) taking coal at Newark, Ill.



RAILROAD

Sy Retch



Manufacturers Railway diesels are painted bright green with a white and gold trim.

Fe, C&EI, Erie, GTW, Monon, and Wabash. The C&WI also operates commuter passenger service to Danton, 16.6 miles from Chicago.

Chicago, Aurora & Elgin Railway: A 54-mile electrically-powered commuter road operating between Forest Park, Wheaton, Elgin, and Aurora, with a freight branch to Batavia. Electric power handles freight service to on-line industries.

Chicago Heights Terminal Transfer: 7-mile switching and terminal road, owned by C&EI and serving the Chicago Heights area. Connects with B&OCT, C&EI, CMSP&P, EJ&E, and NYC.

Chicago North Shore & Milwaukee: 107-mile electrically operated commuter road between Skokie, Mundelein, and Milwaukee. It gains access to Chicago over CTA tracks. Freight service is operated with electric power over all North Shore lines, including a freight branch to Highwood. Principal connections with EJ&E, C&NW, CMSP&P, and Soo Line.

Chicago Produce Terminal: Owned by the IC and Santa Fe, it operates the world's largest consolidated fruit and vegetable railroad terminal, including 29 miles of track in Chicago. Connects with IC, Santa Fe, and other roads.

Chicago River & Indiana: Owned and operated by NYC, it owns and operates facilities of the former Chicago Junction Ry. It operates 21 route-miles and 209 track-miles of terminal and switching roads in Chicago. Connects with all roads entering Chicago.

Chicago Short Line Railway: A 29-track-mile switching and terminal railway in Calumet District of Chicago, serving various industries. Connects with

EJ&E, B&O, BRC, CRI&P, IHB, B&OCT, C&O, C&WI, Erie, Monon, NKP, and Wabash.

Chicago South Shore & South Bend: This mainline electrically-powered road between Kensington, Ill., and South Bend, Ind., hauls passengers and freight electrically over 77 route-miles. Gains access to Chicago via the IC. Freight connections with NYC, GTW, Monon, C&O, B&O, EJ&E, Pennsy, IHB, Wabash, B&OCT, BRC, C&WI, IC, and Rock Island.

Chicago Union Station Co.: Operates a 13.32-track-mile passenger-station facility in Chicago used by GM&O, CB&Q, CMSP&P, and Pennsy.

Chicago, West Pullman & Southern: Operates 30.61-track-mile terminal and switching road between West Pullman and Irondale, Ill., in South Chicago area. Has principal connections with CRI&P, NYC, IC, Pennsy, BRC, IHB and EJ&E.

Columbia & Millstadt: A 7-mile road connecting GM&O at Millstadt Jct. to the Columbia Quarry Company's railroad located at a quarry in that area.

Davenport, Rock Island & Northwestern: A 48-mile road over whose tracks the CB&Q and CMSP&P operates between Davenport and Rock Island. It also operates switching services in Tri-Cities area.

East St. Louis Junction: This 24.19-mile switching road, serving National Stock Yards at East St. Louis, has principal connection with TRRA.

Elgin, Joliet & Eastern: Known as the Chicago Outer Belt, this terminal, transfer, and switching road serves as a method of bypassing Chicago by transferring freight between the outlying

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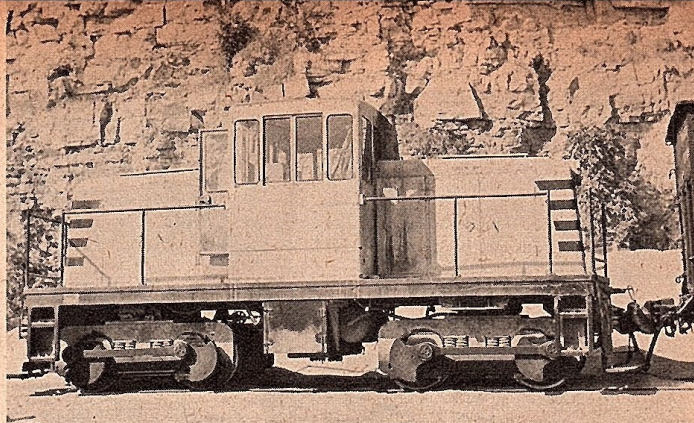
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Side-rodded GE switcher of the Columbia & Millstadt Railroad waits at the quarry.

yards of various major railroads. This 236-mile road runs between Waukegan and Porter, with branches to Gary, Aurora, Goose Lake, and Chicago. Connects with all railroads in Chicago area.

Galesburg & Great Eastern: A 10-mile switching road between Victoria and Wataga, where it connects with the Burlington.

Illinois Northern: A 19-mile switching road serving Chicago's West Side. Connects with CB&Q, CR&I, C&NW, CGW, Soo Line, CMSP&P, Pennsy, IC, NYC, C&IW, CNY&SL, Santa Fe, GM&O, B&O, B&OCT, GTW, BRC, and IHB.

Illinois Terminal Railroad: A 349-mile mainline extending from St. Louis to Peoria and Champaign, with switching facilities on east bank of the Mississippi River, opposite St. Louis. Formerly a passenger-carrying road powered by electricity, it is now freight-only, connecting with railroads in St. Louis area as well as other intersecting lines.

Indiana Harbor Belt: Owned and operated by NYC, it operates 126 track-miles (653 route-miles) of switching, transfer, and terminal railroad services as NYC's principal Chicago terminal. Operates freight belts in the Chicago area which connect with most railroads.

Jerseyville & Eastern: A 1.96-mile switching and terminal line that serves industries and team tracks in Jerseyville, Ill. Principal connection with GM&O.

La Salle and Bureau County: A 15-mile switching road operated between La Salle and Ladd with principal connections with the IC, C&NW, NYC, and Burlington.

Manufacturers Railway: This 42.36-mile road performs bridge transfer serv-

ice between St. Louis and East St. Louis, also terminal and switching service in St. Louis. Principal connections with A&S, MP, and TRRA.

Manufacturers' Junction: A switching road with 1.78 route-miles (13.23 track miles) serving industries and team tracks between West 15th St. and 33rd St., Chicago. Connects with IC, C&IW, BRC, B&OCT, and Burlington.

Missouri & Illinois Bridge & Belt: Owned by the CB&Q, this road with 3 route-miles (5 track-miles) operates a bridge between West Alton and Alton, including terminal tracks in Alton, and connects with CB&Q and NYC.

Missouri-Illinois: Owned by MP, this 172-mile mainline connects Salem with Bismarck with branches to Riverside, Moffat Mine, and connects with MP, CB&Q, IC, L&N, Frisco, B&O, C&EI, GM&O, and Southern.

Paducah & Illinois: Owned by CB&Q, this 13.94-mile terminal railroad extends from Metropolis to Paducah and connects with CB&Q, IC, and L&N.

Peabody Short Line: Formerly known as St. Louis & Belleville Electric Railway, this 18-mile switching line is owned by a mining company and serves between River King Mine and East St. Louis, connecting with the IC, A&S, TRRA, and Southern.

Peoria & Eastern: Operated by NYC, this 202-mile mainline runs between Pekin and Indianapolis.

Peoria & Pekin Union: This switching and transfer road in the Peoria area with 16 route-miles (147 track-miles) connects various mainline roads that enter Peoria and serves industries in the area.

Peoria Terminal Co.: Owned by the CRI&P, this 22-mile switching road operates terminal and transfer service

RAILROAD

for its parent company, with connections at Peoria.

Terminal Railroad Association of St. Louis: Owned by the various roads entering St. Louis, this company operates 347 track-miles, including St. Louis Union Station, Eads Bridge, Merchants Bridge, and Elevated Railroad, several yards, and other trackage, both freight and passenger. It serves all the rail-

roads in St. Louis-East St. Louis area.

Toledo, Peoria and Western: This 235 route-mile mainline serves as an important bypass for freight around both Chicago and St. Louis, connecting with many roads.

Union Stock Yard & Transit Co.: Operates both the Chicago stock yards and the railroad track serving them, and is operated over by the CR&I.

ILLINOIS SHORTLINE RAILROADS

Roster compiled by Sy Reich

Alton & Southern Railroad

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arrngt.	Trac. Eff.	Weight	Date	Notes
—	28-42	1500	Alco-GE	RS-2	B-B	75,500	251,640	1947-8	
—	43-45	1600	Alco-GE, Alco	RS-3	B-B	78,000	248,400	1950,3,6	

Baltimore & Ohio Chicago Terminal Railroad

L-3	900-904	—	Baldwin	—	0-6-0	52,700	210,000	1901	1
SE-1	8416-8421	600	GM-EMD	SW-1	B-B	49,500	198,000	1942	2
SE-4	9509-9511	1000	GM-EMD	NW-2	B-B	62,100	248,400	1943	3
SE-6c	9600-9607	1200	GM-EMD	SW-9	B-B	61,625	246,500	1952	4

Belt Railway of Chicago

(Complete roster in June '58 issue of Railroad Magazine)

Chicago & Illinois Midland Railway

—	18-19	1200	GM-EMD	SW-1200	B-B	61,200	247,800	1955	
—	20-23	1200	GM-EMD	SW-1200	B-B	61,400	248,800	1955	
—	50-54	1750	GM-EMD	SD-9	C-C	90,300	372,200	1955	

Chicago & Illinois Western Railroad

—	101-103	1200	GM-EMD	SW-7	B-B	62,000	248,000	1950	
—	104	1200	GM-EMD	SW-9	B-B	62,000	248,000	1951	

Chicago & Western Indiana Railroad

—	250-251	1000	GM-EMD	NW-2	B-B	62,500	249,000	1947	
—	252-263	1000	Alco-GE	RS-1	B-B	72,400	251,000	1949-50	

Chicago, Aurora & Elgin Railway

(Complete roster in Aug. '59 issue of Railroad Magazine)

Chicago Heights Terminal Transfer Railroad

—	104-105	660	Alco-GE	SI	B-B	49,500	202,150	1942	
—	132-133	1200	GM-EMD	SW-7	B-B	60,720	242,890	1950	
—	227-230	1500	GM-EMD	GP-7	B-B	62,658	250,630	1950-1	5

Chicago North Shore & Milwaukee Railroad

(Complete roster in Aug. '59 issue of Railroad Magazine)

Chicago Produce Terminal

Owms no equipment. Leases IC and Santa Fe diesels.

Chicago River & Indiana Railroad

DES-15a	8400-8405	1000	LH	yd. switcher	B-B	60,100	240,400	1949	
DES-15b	8406-8411	1200	LH	yd. switcher	B-B	61,750	247,000	1951	
DES-19a	9800-9820	800	LH	yd. switcher	B-B	57,200	228,800	1951	

Chicago Short Line Railway

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arrngt.	Trac. Eff.	Weight	Date	Notes
—	101	?	Baldwin	VO	B-B	?	?	1944	
—	200-201	600	GM-EMD	SW-1	B-B	49,500	198,000	1942	
—	2 units, specifications unknown to us.								

Chicago South Shore & South Bend Railroad

(Complete roster in Aug. '59 issue of Railroad Magazine)

Chicago Union Station Company

Owms no equipment. GM&O, CB&Q, CMSP&P, and PRR uses its facilities.

Chicago, West Pullman & Southern Railroad

—	40-41	1000	Alco-GE	SI	B-B	49,630	232,100	1944, '9	
—	42-46	800	GM-EMD	SW-8	B-B	57,000	230,000	1952	
—	47-48	1200	GM-EMD	SW-9	B-B	60,850	246,700	1952	

OCTOBER, 1959

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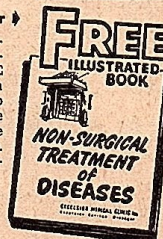
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Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Columbia & Milstadt Railroad									
—	29	300	GE	50-ton	B-B	25,000	100,000	1949	
Davenport, Rock Island & Northwestern Railway									
—	1-7	1000	Alco-GE	S4	B-B	59,950	239,800	1952-3	
East St. Louis Junction									
—	70-74?	600	GE	70-ton	B-B	35,000	140,000	1949	
Elgin, Joliet & Eastern Railway									
—	100	2000	BW	DT 6-6-20	C-C	93,000	372,000	1946	6
—	101-126	2000	BW	DT 6-6-20	C-C	88,500	354,000	1948,50	6
—	200,208	600	GM-EMC	SW	B-B	51,500	206,000	1936,7	
—	210-217	600	Alco-GE	S1	B-B	49,500	198,000	1940-1	
—	220-224	600	GM-EMD	SW-1	B-B	50,000	200,000	1940	
—	225-246	600	GM-EMD	SW-1	B-B	49,500	198,000	1940-1	
—	270	660	Baldwin	VO	B-B	49,500	198,000	1940	
—	272	660	Baldwin	VO	B-B	49,250	197,000	1941	7
—	403-407	1000	GM-EMD	NW-2	B-B	62,500	250,000	1940-1	
—	409-443	1000	GM-EMD	NW-2	B-B	62,000	248,000	1947,9	
—	452-462	1000	Alco-GE	S2	B-B	58,000	232,000	1940,1,4,8	
—	475-484	1000	Baldwin	VO	B-B	59,500	238,000	1941,4	
—	500-501	1500	BW	DRS 6-6-15	C-C	82,500	330,000	1949	8
—	600-602	1750	GM-EMD	SD-9	C-C	88,500	354,000	1957	
—	700A-701A	1500	BW	DR 4-4-15	B-B	65,300	261,200	1949	9
—	700B-701B	1500	BW	DR 4-4-15	B-B	63,775	255,100	1949	10
—	800-809	1500	Alco-GE	RS-2	B-B	62,500	250,000	1948-9	
—	900-926	2000	GM-EMD	—	C-C	88,500	354,000	1948,50	6
—	T-1-T-4	—	EJ&E	hump trs.	B-B	—	250,000	1951,6,7	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Galesburg & Great Eastern Railroad									
—	5	500	Whitcomb	80-DE-5	B-B	40,000	160,000	1941	11
—	6	540	Whitcomb	80-DE-8	B-B	40,000	160,000	1943	11

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Illinois Northern Railway									
—	29-34	1000	Alco-GE	S2	BB	57,500	230,000	1950-1	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Illinois Terminal Railroad									
—	700-711	1000	Alco-GE	S2	B-B	69,000	230,000	1948,50	
—	725	800	GM-EMD	SW-8	B-B	69,000	230,000	1950	
—	751-756	1000	Alco-GE	RS-1	B-B	72,000	240,000	1948,50	
—	775-786	1200	GM-EMD	SW-1200	B-B	62,000	248,000	1955	
—	1600-1605	1500	GM-EMD	GP-7	B-B	60,000	240,000	1953	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Indiana Harbor Belt Railroad									
DES-13c	8715-8718	1000	GM-EMD	NW-2	B-B	62,075	248,300	1948	
DES-13d	8719-8739	1000	GM-EMD	NW-2	B-B	62,075	248,300	1948	
DES-13g	8774-8789	1000	GM-EMD	NW-2	B-B	61,750	247,000	1949	
DES-13h	8790-8802	1000	GM-EMD	NW-2	B-B	61,625	246,500	1949	
DES-13k	8811-8834	1000	GM-EMD	NW-2	B-B	61,750	247,000	1949	
DES-16a	8835	1200	GM-EMD	SW-7	B-B	61,800	247,200	1949	
DES-16b	8836-8850	1200	GM-EMD	SW-7	B-B	61,625	246,500	1950	
DES-16d	8856-8879	1200	GM-EMD	SW-7	B-B	61,625	246,500	1950	
DES-16r	9002-9008	1200	GM-EMD	SW-9	B-B	61,600	246,400	1953	
DHT-2d	473-474	—	NYC	—	B-B	66,500	266,000	1950	12
DHT-2e	476	—	NYC	—	B-B	65,250	261,000	1954	12

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Jerseyville & Eastern Railroad									
—	2 units	—	—	—	—	—	—	—	specifications unknown to us.

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Joliet Union Depot Company									
Owns no motive power. Various roads use its facilities.									

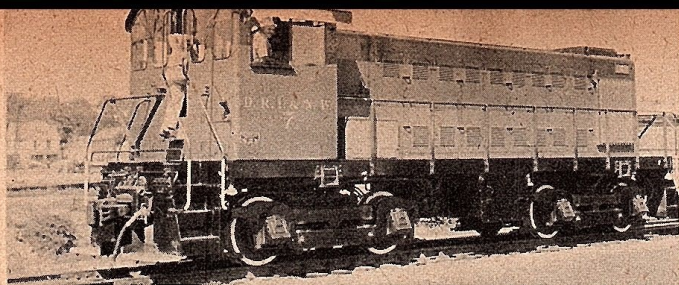
Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
La Salle & Bureau County Railroad (All-time roster)									
—	1 (Heglers Bull)	—	Baldwin	—	0-6-0	?	90,000	1890	
—	2	—	Baldwin	—	0-6-0	?	184,000	1918	
—	3	—	Baldwin	—	2-8-0	?	190,000	1923	13
—	4	—	Baldwin	—	0-8-0	?	180,000	1926	14
—	5	?	Fate Root Heath	—	B-B	35,000	140,000	1945	
—	6	750	BW	DS 4-4-7.5	B-B	50,000	200,000	1948	
—	7	?	Alco-GE	?	B-B	?	?	1950	15
—	8	880	BLHW	S-8	B-B	57,500	230,000	1955	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Manufacturers Railway									
—	201-2107	1000	Alco-GE	S2	B-B	59,000	235,000	1940-8	16

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Manufacturers' Junction Railway									
—	2 units	600	GM-EMD	SW-1	B-B	49,500	198,000	?	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Missouri & Illinois Bridge & Belt Railroad									
—	100	380	GE	44 ton	B-B	22,000	88,000	1941	

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
Missouri-Illinois Railroad									
—	51	1000	GM-EMD	NW-2	B-B	60,950	243,800	1949	
—	61	1500	Alco-GE	RS-2	B-B	57,650	230,600	1949	
—	62-74	1600	Alco-GE	RS-3	B-B	60,500	242,000	1951-5	



Locos of Davenport, Rock Island & Northwestern are painted three shades of red.

Railroad Class	Road Nos.	HP	Builder	Model	Whl. Arngt.	Trac. Eff.	Weight	Date	Notes
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Paducah & Illinois Railroad

Owns no motive power. CB&Q uses its facilities.

Peabody Short Line Railroad

—	701	1500	Alco-GE	RS-2	B-B	62,125	248,500	1949	17
—	702-703	1500	Alco-GE	RS-2	B-B	61,620	246,500	1947	18

Peoria & Eastern Railway

DES-16g	8904-8910	1200	GM-EMD	SW-7	B-B	62,000	248,000	1950	
DRS-4c	5612-5623	1500	GM-EMD	GP-7	B-B	61,550	246,200	1950	
DRSP-4d	5624-5625	1500	GM-EMD	GP-7	B-B	61,550	246,400	1950	

Peoria & Pekin Union Railway

D-3	300-301	1000	Alco-GE	S2	B-B	49,570	231,900	1941-2	
D-4	400-405	1000	GM-EMD	NW-2	B-B	61,700	246,500	1947-9	
D-4-A	406-410	1200	GM-EMD	SW-7	B-B	61,600	246,400	1950	
D-4-A	411-412	1200	GM-EMD	SW-9	B-B	61,600	246,400	1951	

Peoria Terminal Company

S-50	501	600	GM-EMC	SC	B-B	50,000	200,000	1937	
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Terminal Railroad Association of St. Louis

D	501-508	600	GM-EMD	SW-1	B-B	49,950	199,800	1940,7	
D-1	521-524	660	Alco-GE	S1	B-B	59,688	198,960	1941	
D-2	531-532	660	Baldwin	DeLaVerne	B-B	61,194	203,980	1940	
D-2	533-534	660	Baldwin	VO	B-B	59,256	197,250	1942	
D-3	551-567	1000	GM-EMD	NW-2	B-B	62,000	248,000	1940-9	
D-4	569-590	1000	Alco-GE	S2	B-B	49,500	231,500	1941-9	
D-5	591-601	1000	Baldwin	VO	B-B	71,000	237,000	1941,2,4	
D-5	602-603	1000	FW	DS 4-4-1000	B-B	68,650	229,500	1949	
D-6	700-703	1000	FM	ALT 100.4a	B-B	65,000	243,000	1947-9	
D-7	1200-1205	1200	LH	yd. switcher	B-B	62,625	250,500	1950	
D-8	1600-1603	1600	Alco-GE	RS-3	B-B	61,825	247,300	1950	
D-9	1206-1218	1200	GM-EMD	SW-9	B-B	62,000	248,000	1952	
D-9	1219-1226	1200	GM-EMD	SW-1200	B-B	62,000	248,000	1955	
D-10	1250-1253	1200	BLHW	S-12	B-B	59,750	239,000	1952	

Toledo, Peoria & Western Railroad

—	100-101	1500	GM-EMD	F-3A	B-B	55,000	232,500	1947	
—	102-103	1500	GM-EMD	GP-7	B-B	60,100	240,750	1952	
—	200-206	1500	Alco-GE	RS-2	B-B	57,250	229,000	1948-9	
—	207	1400	Alco-GE	RS-3	B-B	60,000	240,000	1950	
—	300-302	1000	LH	yd. switcher	B-B	60,000	240,000	1949-50	19
—	400-401	1800	Alco Pr.	RS-11	B-B	58,000	231,440	1958	

Union Stock Yard & Transit Company

Owns no motive power.

Miscellaneous Notes

For roster purpose we define SHORTLINE RAILROAD as a common carrier whose total route-length is 399 miles or less. Roster compiled from data supplied by supt. of motive power, Alton RR; supt. of motive power, B&O; supt. transp. & equip., C&M; IC motive power dept.; road foreman of engines, C&W; supt. motive power & p. a., C&E; chief mech. officer, NYC System; auditor, CWP&S; supt. motive power and equip., E&E; vice president, G&E; gen. mgr., LS&BC; GM-EMD; supt., M&B&B; public relations dept., MP; general supt., PSL; supt. motive power and equip., P&U; general supt. motive power, CR&P; supt. motive power and equip., TRRA; supt. motive power and equip., TP&W; Montague L. Powell.

Abbreviations used: hump trs., hump trailers; yd., yard; Alco, American Locomotive Co.; GE, General Electric; BW, Baldwin-Westinghouse; BLHW, Baldwin-Lima-Hamilton-Westinghouse; LH, Lima-Hamilton; GM-EMD, General Motors, Electro-Motive Div.; GM-EMC, General Motors, Electro-Motive Corp.; FM, Fairbanks-Morse; Alco Pr., Alco Products.

(1) Cylinders 24x28 ins., boiler pressure 200 pounds per sq. in., ex 1700-1704.

(2) Ex 216-221, class DS-3E.

(3) Ex 409-411, class DS-4E.

(4) Ex 590-597, class DS-17EC.

(5) Leased to and stenciled C&E.

(6) Being rebuilt by GM-EMD and renumbered from 100's to 900's with same two last digits.

(7) Sold to B&O, renumbered 375 and classed DS-21B. Now number 8200 class SB-1.

(8) Ex B&E 401-402, class W-3A.

(9) Sold to B&O, renumbered 847,849 and classed DF-9. Now numbers 4200-4201, class FB-1.

(10) Sold to B&O, renumbered 847X,849X and classed DF-9X. Now numbers 5200-5201, class FB-1X.

(11) Purchased second-hand from Pan-American Engineering Co. in 1955.

(12) Rebuilt from class DES-3, Alco-GE-Ingersoll Rand three power locomotives.

(13) Ex Colorado Midland.

(14) Ex Chicago Junction Railway.

(15) Ex North East Oklahoma Railroad.

(16) Three units sold to Kansas City Southern in Apr. '56, renumbered 1121-1123.

(17) Ex St. Louis & Belleville Electric Ry. 700.

(18) Ex Union RR. 602-603, rebuilt Oct. '58 to 1600 hp.

(19) Sold 1958 to Lipsett Steel Co., Acme Steel Co., and H. Barston Co., respectively.

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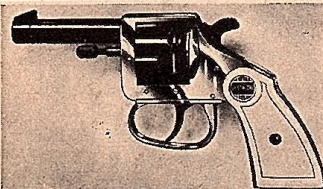
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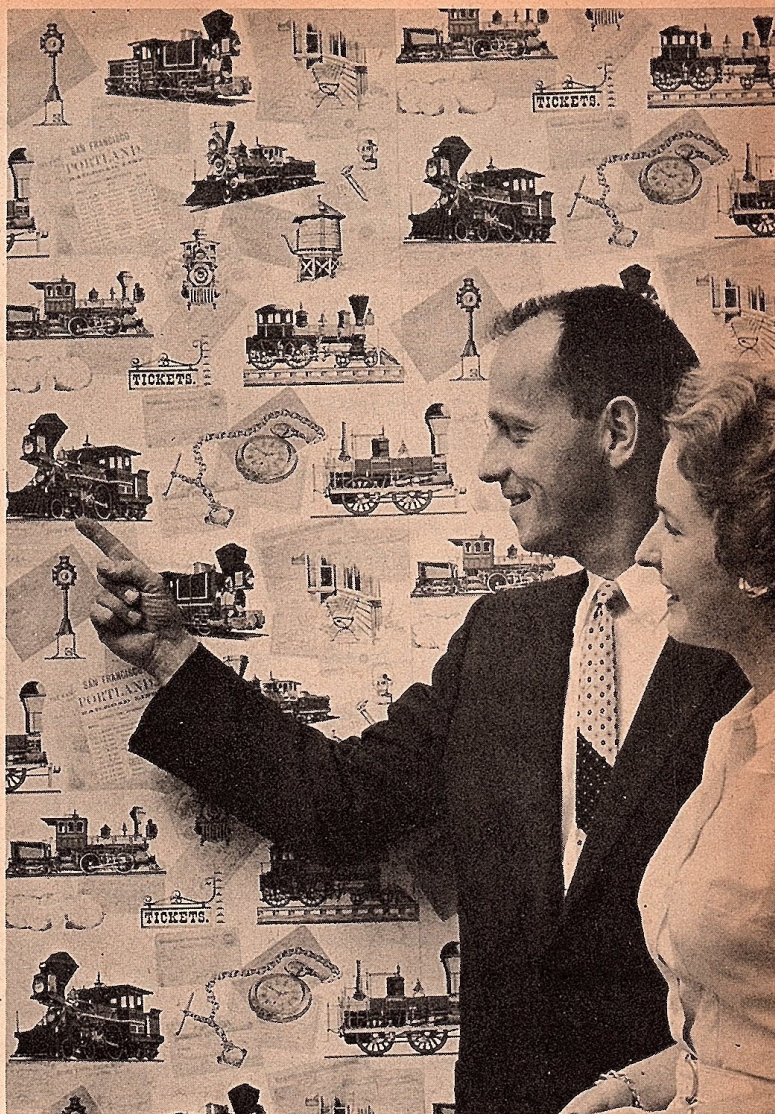
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New hobby-room wallpaper features reproductions of oldtime locomotives on the SP, Santa Fe, WP, and GN plus other railroadiana. Designed by Jerry Biederman, this paper is distributed by W. P. Fuller & Co. Details available from Charles von Loewenfeldt, Inc., Room 500, The News Bldg., San Francisco, California.

Next Issue: December (out Oct. 1)

Heading our features will be "The Mikado Type," by a well-known authority in the field, H. L. Kelso. Also "Montana's Only Interurban," by Paul Busch, veteran of that road. Loco rosters of the Rock Island and the Florida East Coast. Plus a good fiction story by Harry Bedwell, short hauls, your favorite departments, many choice pix, and a colored cover that you'll find especially pleasing.

RAILROAD HOBBY CLUB

by Sy Reich

DOWN in North Carolina, the small rural Cliffside Railroad refuses to accept the Diesel Age. This line is proud of its 12-ton steamer,



Sy Reich

No. 110, known affectionately as "Little Dummie," which runs daily except Sunday over three miles of track between Cliffside and Cliffside Jct., plus an additional seven-eighths of a mile between the Junction and Avondale. The Cliffside's only business is hauling supplies into the two villages and two mills and taking out mill products to connecting lines. No. 110 is one of three locomotives that R. R. Haynes bought second-hand in 1905 for the Cliffside Mills. It is said that all three ran originally on elevated lines in New York City. The Cliffside now has only two steam engines, one Baldwin and one Vulcan; also a boxcar, a caboose, and a revamped baggage car. The engineer is Odell Biggerstaff and the fireman "Shine" Freeman.

Among the very few logging roads in the Northwest that still use steam are Weyerhaeuser Timber Co. (see *Mail Car* department) and Ed Hines Lumber Co., Hines, Ore., and Rayonier, Inc., Hoquiam, Wash.

Rayonier has just issued an illustrated booklet telling the story of its steam operations. A copy may be obtained free by writing Rayonier, Inc., Public Relations Department, White-Hany-Stuart Bldg., Seattle, Wash., as long as the supply lasts.

Lee Forrest, Rayonier's Northwest Timber Division manager, says the booklet was prepared in answer to many requests for photos and information on the company's steam locomotives. Rayonier, already a big company, took over an additional 250 miles of logging railroads in the rugged Olympic Peninsula of Washington at the end of World War II. Included in the deal were Bald-

win Mallets and Mikados, other rod-types, and Climax and Shay geared locomotives, many of which were still in daily use until recently.

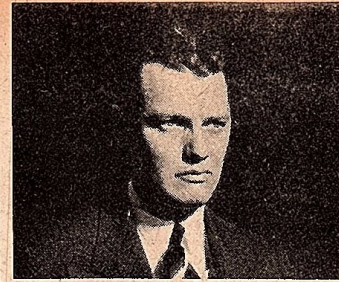
Some photos in the booklet reach back through more than half a century of the logging industry's colorful past. The engine types shown are typical of those that helped to give the era its greatness.

With their grates cold and the lonesome wail of their whistles stilled forever, the last of Santa Fe's steam locomotives have reached the end of the line. The 77 engines now being sold for scrap are all that remain of a great fleet of 2,000 which thundered over the rails between Chicago and California and the Gulf of Mexico. Those 77 were stored at Chillicothe, Ill.; Argentine and Wellington, Kan.; Waynoka, Okla.; Amarillo, Tex.; Clovis, Belen, and Albuquerque, N.M., and Junta, Colo.

Santa Fe was one of the first big roads to be dieselized. During recent years it relied on steam only occasionally to supplement diesel power in peak movements of grain and perishables. Present size of the diesel fleet, including 69 new units now in process of delivery, make it unnecessary to hold the old engines any longer.

However, 39 Santa Fe steamers are being preserved in public parks. The company itself will keep two of its largest locomotives for posterity. They are the 2925, a 4-8-4 with 80-inch drivers, weighing about 255 tons, and the 5021, a 2-10-4 with 74-inch drivers, weighing about 270 tons. Baldwin built both in 1944.

The company also is preserving two others. One is the 1010, a 2-6-2 built by Baldwin in 1901. She is the sole survivor of 19 engines used on the *Coyote Special* when "Death Valley Scotty" chartered a Santa Fe train in July, 1905, and made a record run from Los Angeles to Chicago in 44 hours, 54 minutes. The other engine being preserved is the *Cyrus K. Holliday*, a 2-8-0 diamond-stacked museum piece named after the road's founder. With two wood-



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en coaches, she is exhibited often at fairs and celebrations.

Like a voice from the past, you can hear a mournful whistle now and then on the waterfront at Oakland, Calif., as the only standard-gage steam engine left puffing in the Bay area, old No. 6, continues to switch freight cars on the Howard Terminal. But she works only while the HT's 50-ton diesel is being repaired or checked over. Both locomotives move cars to and from the Southern Pacific and the Western Pacific.

The 6-spot, a Baldwin 2-6-2, began her career in 1922 as No. 30 on the Sierra Railroad, wheeling passengers and freight over the 19-mile branch between Jamestown and Angel's Camp, Calif. The Howard Terminal bought her in 1937, removed the tender that carried her water and fuel oil, built a fuel-oil tank behind the cab, and wrapped a saddle tank around her boiler for water supply. These changes ruined her girlish figure but improved her usefulness. A. H. Marshall and Earl E. Roberts, who operate both HT locomotives, say that "No. 6 is good for another 50 years." Maybe some reader will send us her picture.

Best places to see Canadian National steam engines operating are Manitoba and Saskatchewan, where hundreds were still working in June, while Canadian Pacific has some steam left in Ontario, Quebec, and Manitoba, reports Doug Cummings.

Dave Plowden, the camera man who made those shots of New York Central ferries in this issue, has just returned from Canada with the news that Canadian National has only six active steam engines at Hamilton, Ont.—three switchers (one of them a spare), two Mikes, and an old Consolidation. He expected CNR east of Port Arthur to be fully dieselized early this summer. Dave reports more bad news. No. 5244, the Pennsy's last active steamer, operating (only Monday mornings, as a rule) on the Union Transportation Co. out of New Egypt, N. J., will be retired Sept. 30, then scrapped. The crew love this old girl, but find it increasingly difficult to make even minor repairs on her. (See Information Booth, No. 27)

Although some logging roads and a few others may carry on with steam indefinitely, we advise photographers to rush to Canada to record the last mainline steam operation in English-speaking

North America. By this time next year, we predict, there won't be any left. Here is a list of steam, both live and dead, in Canada, based on data supplied by Dale Davies, Ken Shomers, Martin Jergens, and Mr. Evans:

Ladysmith, B. C.: Comox Logging & Ry.—2-8-2T, 2-6-2T, Shay, 2-8-2.
Chernabus, B. C.: MacMillan & Blodet—2-6-2T, 2-8-2T, 2-6-2.
Paldi, B. C.: Mayo Lumber Co.—Shay.
Mesachie Lake, B. C.: Hillcrest Lumber—2 Climax.
Honeymoon Bay, B. C.: Canadian Forest Industries—Shay.
Crofton, B. C.: Osborne Bay Wharf Co.—Shay.
New Westminster, B. C.: Pacific Coast Terminals—two 0-4-0's.
Vancouver, B. C.: CPR—4-6-2; CNR—2-10-2.
Union Bay, B. C.: Canadian Collieries—two rod engines.
Englewood, B. C.: Canadian Forest Products—large steam operation.
St. Johns, N. B.:—2 steam switchers.
Toronto, Ont.: CPR—4-6-0, 4-6-2, 4-6-4, 2-8-0, 2-8-2.
Havelock, Ont.: CPR—4-6-0, 2-8-0.
Wacater, Ont.: CPR—4-6-4.
Port McNicoll, Ont.: CPR—2-8-0, 2-8-2.
Trenton, Ont.: CPR—4-6-0.
Owen Sound, Ont.: CPR—4-6-2.
Sydney Mines, N. S.:—all steam, including an old diamond-stack loco still in use. About 12 steamers all told.
New Glasgow, N. S.:—only steam, 2-6-0's.

Steam is really on its way out, as George S. Dennis writes from Box 65, Terrace Bay, Ont., Canada. "The other day," he says, "I went to Sudbury, Ont., where my brother works for the Canadian Pacific as an engineer. My purpose was to make tape recordings of steam sounds from his cab. We had the 5149 on a Monday, but the next two days she was kept in the roundhouse for a little doctoring. I found the following engines with steam up, ready to go: 5367, 5362, 5325, 5364, and 2423. The 3607 was having quite a bit of work done on her, but was almost ready to go by the time I left Sudbury.

"I saw a westbound train double-headed with a 2500 and a 1200 Class steamer, also a drag hauled by a 2400. The CPR has no steam between Cartier, Ont., and Winnipeg, Man., except perhaps for work trains. I taped considerable CNR steam at the lakehead cities of Port Arthur and Fort William, thanks to the helpfulness of engine, yard, and train crews.

"Incidentally, Neebing yards has a streetcar and track for the exclusive use of hump riders. Could get a photo if *Transit Topics* is interested."

Please do. T.T. is interested.

Golden anniversary (June '59) issue of *Illinois Central Magazine* is a fascinating souvenir with 4-color cover and 32 pages of historical facts and pix. One photo is captioned: "Mighty Central-type locomotives, now in 'moth-ball' fleet at Paducah, Ky., were the most powerful class of steam locomotives ever to run on the IC... On rare occasions they help with peak loads."



Homer G. Benton



Jim Scribbins

"Steam is dead on the SP," laments H. W. Demoro, 330 Height Ave., Alameda, Calif. "The West Oakland roundhouse is being razed and the trackage in that area being relocated. Many engines are in storage at San Francisco's Bay Shore Yards, a few at West Oakland. Many historical pieces of equipment are stored in Western Pacific's Oakland roundhouse.

"San Francisco Municipal Ry. is all PCC and still operates five car lines. Three cable-car lines also are still running. Key System's handsome rail terminal in San Francisco, formerly used by the now-abandoned bridge trains, is now reserved for buses. Soon, rails will be removed from the bridge."

Midland Electric Coal Corp. at London Mills, about 25 miles west of Peoria, still uses a couple of ex-M&St.L 0-6-0's (still numbered in 80 series, reports Paul Stringham, P.O. Box 743, Peoria, Ill.) Those two, plus the Rock Island's 887, a 4-6-2, on display in Glen Oaks Park, Peoria, are the only steam engines in this area.

"It is not true that the only steam-powered mixed train operating in America is the Rio Grande's Silverton run, as stated in *Railroad Magazine*," writes Walter A. Hodges, Jr. "There is also one on the 7-mile Moscow, Camden & St. Augustine in Texas—No. 201, a Mogul, usually pulling one or two cars and the road's old combine."

"I stopped in recently at Cheyenne, Wyo., to see the Union Pacific 'Big Boys' stored there," says Lawrence Geddis, 15362 Cameron, Wyandotte P.O., Mich. "Vandals are doing a nasty job on gages, windows, seatboxes, headlights, etc."

Elmer H. Geiser, who had 35 years experience with Baldwin Locomotive Works, operates a unique service sup-

plying parts, specifications, and working drawings for steam locomotives. He has data on everything from piston rod to boiler for almost every loco Baldwin ever built. Now that Baldwin no longer builds engines, he finds quite a demand for such items, including many requests from overseas roads. If railfans show enough interest, he would have much of this material reproduced for operating museums, etc. His array of builder's photos, which includes both the well-known and the obscure, is in itself a history of Baldwin. He lives at 1339 W. Rockland St., Philadelphia, Pa.

Setouts and Pickups

IN ANSWER to many requests and with patient care, Jim Scribbins and Homer G. Benton compiled our list of retired steamers. Jim lives at 3203 S. Howell Ave., Milwaukee, Wis., is employed by the Milwaukee Road's Passenger Department. He helped to found the Wisconsin Chapter of NRHS and has done quite a bit of writing for railfan publications.

Homer was born and raised under a haze of Pennsy locomotive smoke at Altoona, Pa., grew up among railfaring men, and worked for one summer on the Santa Fe & Disneyland passenger train at Disneyland, Calif. He is a member of R&LHS and is Chaplain, U.S. Army, 4th Inf. Div., at Ft. Lewis, Wash.

Railroad Enthusiasts, N.Y. Div., announce a big round trip via CPR and PGE to Winnipeg, Vancouver, Banff, Quesnel, Dawson Creek, and Edmonton, Aug. 15 thru Aug. 30. Contact Ed Hansen, 817 S.E. 14th Dr., Deerfield Beach, Fla.

Labor Day weekend rail trip to Colorado sponsored by Pacific RR. Society, P.O. Box 5279, Metropolitan Station, Los Angeles 55, Calif., which will send information on request regarding many interesting features. Price, \$88 up for adults (\$68 up for children), including fare, meals, lodgings, etc.

Labor Day weekend Grand Canyon-Ariz./trip by the Santa Fe leaves San Francisco 7:15 p.m. Sept. 4. Fare \$85 up (kids \$55 up). Get details from Central Coast Railway Club, P.O. Box 783, San Jose, Calif.

Sept. 27, LIRR rail-diesel-car tour of Long Island's north shore to Greenport and Oyster Bay. Rail fare \$5 if

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paid before Sept. 19; \$6 thereafter. Contact Everett White, Pres., Railway Travel Club, 481 Twelfth St., Brooklyn, New York.

NRHS, Wisconsin Chapter, will sponsor trip one Sunday between Sept. 20 and Oct. 18 over Soo Line's Wisconsin Central route from Waukesha to either Manitowoc or Stevens Point. Fare, incl. lunch, etc., about \$7. Contact Gilbert F. Ziemann, 1016 S. 64th St., West Allis, Wis.

We welcome roster corrections. Richard W. Haave calls attention to a matter which, curiously enough, had been covered as note 10 in our C&O roster (Feb. '59) but this note inadvertently had dropped out when the magazine went to press. It read, "Nos. 5297 and 5298 are ex-Manistee & North Eastern 2 and 3." Fred Cheney, Bill Volkmer, et al., have convinced us that we slipped a little in describing the color of SAL diesels (rostered in June '59). Actually, they are painted light green (passenger) and olive drab (freight).

A few changes in our Chicago Inter-urban roster come from Bill Blewett and South Shore enginemen. Each SS motor car is equipped with four WH traction motors, not as we indicated. Car 110 was rebuilt from car 10, which in turn was renumbered from car 40. Original 10 was wrecked in 1929. Trailer 213, motorized and renumbered, replaced car 40. Locos 1010 and 1014 were scrapped in '57 and '58 respectively. Loco 706, ex-NYC R-2, was put in service in '58. Add to our roster the line car 1100 and baggage trailers 503 and 504, originally Indiana RR. 376, 375, and 377 respectively, all built by St. Louis Car Company.

Vancouver Island Ry. Historical Assn., 587 McKenzie Ave., Victoria, B.C., Canada, reports that its first bulletin, *Narrow Gauge in the Kootenays*, is now available at 50c a copy. Its next publication will be *Canadian Forest Products: Steam Operation*. We urge fans to buy extra copies of these informative booklets for their friends, because the proceeds from their sale will go toward establishing a railroad museum in Victoria.

National Society of the Sons of Utah Pioneers announces opening of Railroad Village Museum at Corinne, Utah. May's *SUP News* (50c) gives a history of railroading in northern Utah. So-

ciety's headquarters is 2998 S. 2150 East, Salt Lake City 9.

It is heartening to note the trend throughout the U.S. and Canada to establish local railroad museums. For example, Wm. B. Garner, 2745 Fremontia Drive, San Bernardino, Calif., writes: "Our local chapter of the Pacific Railroad Society is sponsoring an operating railroad museum at Perris, Calif. At present we have a mile of right-of-way, 200 feet of track, and a caboose. We're trying to get more rail, any kind of steam locomotive that will run, and other equipment. The Orange Empire Traction Co. has several electric cars on the property and will handle the electric railway portion of the museum. All helpful suggestions from readers will be appreciated."

The Long Island Rail Road will sell you a set of six beautiful 12-ounce, 125th Anniversary glasses at cost price of \$1.50 if you live on Long Island, or \$2 if you don't, payable in advance. These two-tone glasses are pictorial plus LIRR slogan. Just the thing for railfans entertaining their friends. Ideal for rail-club meetings. Orders are taken by H. A. Weiss, Passenger Traffic Mgr., Long Island Rail Road, Jamaica 35, New York.

Thomas T. Taber, one of the men who founded the Railroadians of America, Mayor of Madison, N. J., and occasional contributor to *Railroad Magazine*, wants to buy certain full years and some individual issues of *American Railroad Journal* to fill gaps in his files. Also seeks *Locomotive Engineering* for 1888 thru '91. Tom has some good duplicate issues of the above magazines for trade or sale. Address 43 Hillcrest Rd., Madison, N.J., stating issues available, condition, and price.

An interesting program, including railroad and trolley trips, has been prepared for the annual convention of the National Railway Historical Society, to be held over the Labor Day week-end at Pittsburgh, Pa., with headquarters in Hotel Penn Sheraton. Get details from NRHS, 301 Kingsley St., Philadelphia 28, Pa.

Beautiful, brightly-painted desk models of a 4-2-2-T locomotive, expertly built of stiff cardboard and wood, with wheels and side-rods that can move, may be obtained from A. D. Slater,

2025 Green Road, Cleveland 21, O., at \$3.25 each postpaid anywhere in U.S. Looking at one of them, we were surprised to see that a model requiring so much individual work could be sold for that modest price.

"I've been reading *Railroad* almost 10 years," writes Jim Seacrest, Lincoln, Neb., "but never appeared in the *Switch List* till June '59. The response was terrific. Mail just poured in."

"We have nearly completed a film entitled *Narrow Gauge to Durango*," writes David I. Rees, Executive Director, West Wind Productions, P.O. Box 325, Ajo, Calif. "It will be a two-reel featurette in Eastmancolor, available this fall in both 16mm and 35mm. Included are many close-ups of equipment."

Railroadiana

ALL ENTRIES are printed free, in a good faith but without guarantee. Not over 28 words (including name and address), except when you list old issues of this magazine. Use abbreviations such as *its*. (timetables), *emp. its*. (employees' timetables), and *SAS* (send stamped self-addressed envelope for list or information). If you wish pen pals, specify your interests so they will know what to write about.

Because of printing and distribution schedules, entries for this section should reach us about 10 weeks before magazine is due on newsstands. Address Sy Reich, *Railroad Magazine*, 205 East 42nd Street, New York 17, N. Y.

SWITCH LIST

JOHN AARDEMA (ex Erie tr. dispr.), 224 Slater St., Paterson, N. J., wants pix Colombia (S. America) Rys. 2-8-27, D&RG in Salt Lake City park. Send Interurban pix lists.

J. ALLAN, 3958 S. Hill St., Los Angeles, Calif., buys steam pix Rocky Mt., Pacific Coast areas, n.g. lines.

BOB ANDERSON, 715 Pabst, Ironwood, Mich., buys, trades, sells pix, negs. DM&IR, C&NW, Soo, DSS&A, etc.

DICK AULETTA, 154 Stratford Rd., New Hyde Pk., N. Y., wants certain back issues of *Railroad Magazine*. (SAS)

RALPH BACK, 900 W. Grand Ave., Muskegon, Mich., will sell PM steam diagram book.

L. Y. BEAUJON, N. Lincoln St., Pearl River, N. Y., sells, trades NYC, NYO&W, New Haven, SAL, MP, UP material 1900 to date. Wants CNE, NYO&W items. (SAS)

JACK BEUTAS (Univ. of Illinois, College of Medicine), 912 S. Wood St., Chicago, Ill., wants to hear from amateur rr. photographers in Chicago area. Where can he find steam stored nearby?

BILL BIESECKER, 2263 Lafayette St., N. Bellmore, N. Y., wants info. on Marion River Carry Railroad.

DICK BOGGLANO, 326 Audubon Ave., New York, N. Y., sells pix CNR, CPR, NYC, Pennsy, C&NW, (SAS)

CHAS. BOURGART, Box 310, Ft. Dodge, Iowa, buys photos and pix in mags. of snowbound trains in Iowa blizzard, 2/35.

ELVIRA BRAGA, Centro Regional, Aeroporto de Santa Maria, Azores Islands, will sell "Report of Explorations and Surveys to Ascertain Practical Route for RR., from Miss. River to Pac. Ocean," dated 1857. Make offer.

F. R. BRONOT, 645 E. 54 St., Hialeah, Fla., sells on approval 3/2x5 pix SAL, FEC, ACL, N&W, WM, B&O diesels Wants pix, negs. SAL 4000's, 4100's, 4200's, 4300's, 4500's.

W. BROSCART, 243-20 Superior Rd., Bellerose, N. Y., wants pix Morris Co. Tract., NY & Stamford. Sells size 620 negs. 25c ea. many elec. lines. (SAS)

ANTON BRUNS, 107 Woodbine St., Westside Village, Palms, Los Angeles, Calif., will sell very large private collection 35 mm. train movies. List.

SPENCER BUCHARD, 34 La Forge Rd., Noroton Hts., Conn., buys builders pix, slides NYC steam.

JOHN BURN, Box 1302, Shelby, N. C., buys, trades negs., pix, lanterns, train orders, emp. its., N&W, Vg., Soo, Clinchfield steam.

R. H. CARLSON, Box 222, Combes, Texas, sells 11,000 diff. size 116-pix MP, Katy, T&P, T&NO, Frisco, short lines, log rds., etc. No compl. list. List and sample of rd. you want 10c.

FRED CHAPMAN, 915 4 Ave N., Port Alberni, B. C., Canada, wants 2 telegraph keys, sounders, relays.

AL CHVOSTA, JR., R2B165 Hartland, Wis., will trade 2 books, "Locos in Our Lives," "Transportation for War," for back issues *Railroad Magazine*.

CHANDLER COBB, 168 Whipple Rd., Kittery, Maine, wants railroad items from New England.

R. E. COOPER, Colliersville, N. Y., trades, sells, emp. its., *Railroad Magazine*, Trains, rule books, tr. orders. (SAS)

BRIAN COTTER, 3 Torquay Rd., Darlington, S. A., Australia, sells 4x6 pix South Australian Ry. 5 for \$2, includ. SAR tr. order.

DOUG CUMMINGS, 8070 Oak St., Vancouver, B. C., Canada, buys, trades, sells size 116 negs. steam, elec. NP, CPR, CNR, GN, SP.

WM. DAUTERMAN, 16347 Lahey, Granada Hills, Calif., sells RMC '33-'48. Off. Guides; trades 35mm color slides locos, hacks.

SID DAVIES, 2060 W. 75 Pl., Chicago, Ill., wants info., pix, negs., C&EI locos built 1880-1910. Trades size 616 steam pix.

F. L. DONNENWORTH, Box 533, Powell River, B. C., Canada, wants April '56 *Railroad Magazine*. Sells back issues Trains.

ART DRAKE, CNR Repeater Sta., Kamloops Jct., Kamloops, B. C., Canada, wants current CNR diesel roster.

C. L. DUVIVIER, 76 Sedgewick St., Darien, Conn., wants info., pix NYNH&H early electrification.

C. V. EHRKE, 157 Massachusetts Ave., Springfield, Mass., will swap back issues of Trains, Off. Guide, for copies of *Railroad Magazine* and Trains prior to 1950. Write first.

LYLE EVERSON, Box 1, Viroqua, Wis., will sell *Railroad Magazine* May '47-Oct. '55 exc. Aug. '48; June, Sept., Oct., '53; July '54; June, Sept., '55; all good cond.

BRUCE FOX, 7123 Newburg, San Bernardino, Calif., wants info. AT&SF 2-10-4's; wants to hear from engineer who ran one.

TED GAY, 6 Northview Dr., Morris Plains, N. J., sells p.c. size steam negs. Buys 8mm steam movies.

C. K. GIVEN, 2557 S. Parkview Dr., Norristown, Pa., will sell Pennsy '58 calendar.

R. GOIN, 153 4 Ave., Paterson, N. J., wants NYO&W, Erie, NYS&W switch keys; pix Vgn. 480; sells, trades back issues Trains, Toy Trains, RMC, MRR.

JIM GRAVES, 12031 75th S., Seattle, Wash., will buy Ira Swett's Bulletin 15 or trade 30 back issues Trains, good cond.

RUBIN GRUBER, 1577 Van Horne Ave., Montreal, Que, Canada, buys, sells, trades transfers, tkts., tokens, for trolleys, subways.

CARROLL GUSTAVSON, you gave no address.

RAY HIGGINS, 419 1/2 Katahdin Ave., Millinocket, Maine, will trade *Railroad Magazine* '44-'59 for steam negs. Sells p.c. pix BAR, MEC, CPR, CNR, BAR.

(CONTINUED ON PAGE 82)

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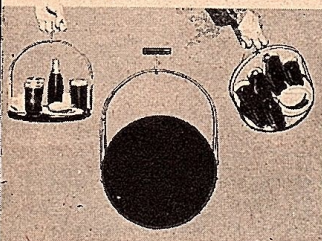
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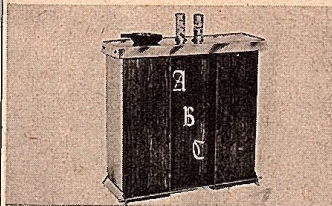
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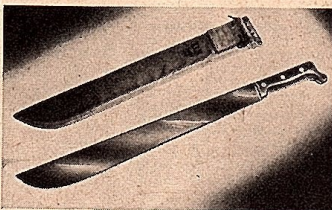
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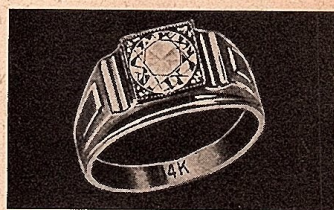
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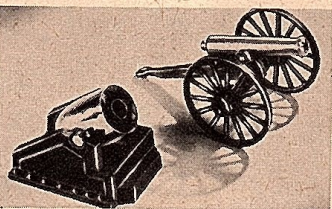
The skilled hand of the German gunsmith is responsible for this .22 caliber, 6-shot repeater automatic with self-ejecting clip. Just 4" long, fits easily into pocket or purse. Ideal for sporting events, stage use (not available to Calif. residents). Comes for \$6.95 ppd. from Best Values, Dept. K-561, 403 Market, Newark, New Jersey.



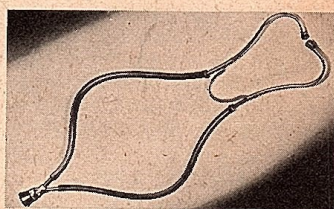
You don't have to cross the border to get one of these 18" blade machetes. War surplus (Army made 'em for use in tropics), you can bush out a trail, clear a camp site, or fell a good-size tree with one of 'em. In sturdy green canvas shield with belt clip. \$2.95 ppd. Arms & Weapons, Dept. A-4, 49 East 41st St., New York 17, N. Y.



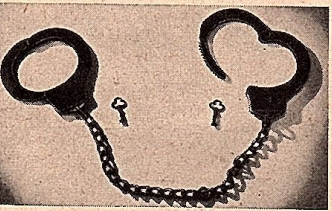
Here's the man-made stone, cut by hand and hand-polished, with the appearance of a costly gem, but without its price. An example is the one-carat stone above which sells for a total of \$27, tax included. For more information and details on easy payments, write to Capra, Dept. A-109, Box 5145, Philadelphia, Pennsylvania.



Civil War cannons are exact replicas of those that roared over the bloody battles of Gettysburg, Shiloh, Ft. Sumter, etc., are made of hand forged iron, with spun bronze barrels. Gun on right is 6" long, mortar is 3". Each, \$3.95 ppd. Both are \$6.95 ppd. Madison House, Dept. AR, 305 Madison Ave., New York 17, N. Y.



Every try to buy one of these? Hard to find, and usually expensive, this is a U. S. Medical Corps stethoscope. Brand new, it's ideal for doctors, engineers and mechanics (to check trouble spots in motors, etc.), educational for kids and adults. Handy in the country. \$2.95 ppd. (half-regular price). Banner Supply, 49 East 41st, N. Y. 17.

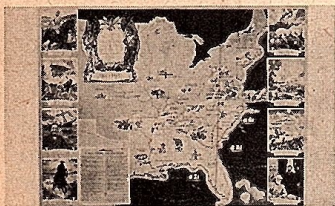


We're not suggesting you do it, but if your wife insists on going shopping and spending all the family coin, these will keep her home. Made during WW II for U. S. Navy at cost of \$12, heavy black steel hand and leg irons are connected by rugged chain, have saw-tooth catch. Brand new surplus. \$3.95 ppd. Kline's, 333-B East 50th St., N. Y. 22.

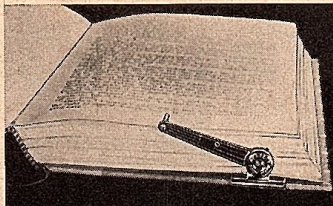


Here is a brand new blue-steel .22 cal. blank cartridge German automatic, clipload 6 shot repeater. Safety catch, self ejecting clip. Adjustable firing spring. Ideal for sporting events, theatrical performances. Made in West Germany. Measures 4" long. For \$6.95 ppd. Big Three Enterprises, Dept. AG-10, 1109 Sixth Ave., N. Y.

All products shown here may be obtained directly from indicated sources. Send check or money order with your order. Manufacturer will refund full purchase price on prompt return of unused, non-personalized items. This department is not composed of paid advertising.



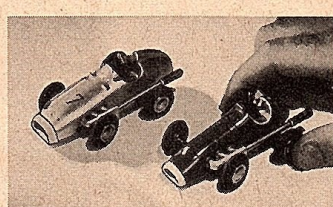
Wall-size picture map of the Civil War shows nearly 100 places, events and campaigns, gives complete information on all. Brilliantly drawn, and in four colors, map has 8 side panels with paintings depicting famous events such as Ft. Sumter, Gettysburg, Bull Run, etc. Measures 23"x23". \$1 ppd. House of Maps, 1308 Lincoln Building, New York 17, N. Y.



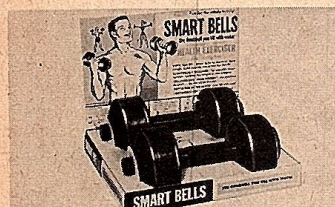
You reach for a ringing phone; your book slams shut; you lose your place. "Never more," quoth the Perfect Bookmark! Ingenious, it keeps place automatically to the last page. Just slip page from under pin—go on reading. No more ruined pages. Comes in nickel plate for \$1; gold plate, \$2 ppd. Unique Items, Dept. A3, Box 45-162, Miami, Fla.



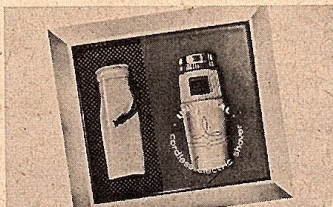
A real boon to motorists! "Spare Air" is an automatic tire inflator for flat tire emergencies. Simple to use—no tools necessary. In seconds provides up to 30 lbs. of air. Can drive to nearest service station without damage to tire, tube, rim or wheel. Saves time and money. Great! \$2.98 ppd. Thorsen, Inc., Dept. AR-287, 585 Water St., N. Y.



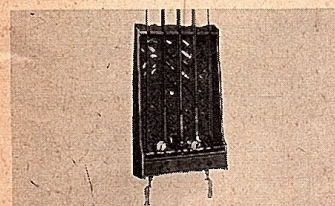
Sleek imported scale models of Mercedes-Benz (top) and Ferrari racers are only 4" long, yet go 20 mph on a straightaway. Beautifully detailed, cars have micro-sensitive adjustment and differential for precision steering, brake, free-wheeling, crash absorber, etc. Nice for \$2.95 ppd. each. Prince Enterprises, 49-B East 41st St., N. Y. 17.



The dumbbell goes intelligent! Called "Smart Bells," this new innovation means body building for the whole family. Lose weight, build muscles and feel really fit. Of light durable plastic—easily adjustable in weight to fit all needs. Exercise chart included. And it's great fun. \$1.98 ppd. Wham-O, Dept. B, 835 E. El Monte, San Gabriel, Calif.



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STEVE HOFFMAN, 511 Wellesley Rd., Philadelphia, Pa., sells IT, WBA tfs., transfers. (SAS)

WALT HOXIE, 600 Hartford, Providence, R. I., has builder's photo B&A Putnam, p.c.'s. Wants old toy trains, trolleys.

JIM IRWIN, 833 Cagua St. S.E., Albuquerque, N. M., will pay good price for Railroad Magazine of Jan. '46, Oct. '45, Feb. '53, April '57, Aug. '48, good cond. Write first.

LOREN JOPLIN, 7419 Bennington Ave., Pico-Rivera, Calif., wants PCC pix.

DICK JOWERS, 3967 Arden Way NE, Atlanta, Ga., will gather pix, info. literature for you on Southern industrial roads.

VERN KELLY, 2 Margaret Pl., Batavia, N. Y., wants certain back issues Railroad Magazine. (SAS).

BOB KENON, 75 Montvale Ave., Stoneham, Mass., buys pix TARS, PSCT, BE, MTA.

N. A. KUTUSOFF, 45 Montecito Ave., San Francisco, Calif., will sell 20 bound vols. ICS steam loco engineer course.

GEO. LARNED, Box 263, Bedford Hills, N. Y., wants projector to use with railroad postcards.

JOHN LECATO, 134 Main, Staten Island, N. Y., buys, trades slides Panama RR steam; M&P steam, stations.

RON LEITCH, 18707 Ferncliffe Ave., Cleveland, O., takes, trades 8mm movies, pix, Cleveland elec. lines. Will sell "Trains Rolling" by McBride.

FRANK LESLIE, 123 Lake Ave., Red Bank, N. J., wants pre-Alco bldrs. plates, N&W plates. Trades plates, steam negs.

R. R. MAGUIRE, 269 Albion St., Wakefield, Mass., will sell Railroad Magazine '56-'58, some with covers missing, also B&O emp. tfs.

BOB MALINOSKI, 246 Madison Ave., New Milford, N. J., sells size 120 steam negs. PRR, B&O, GTW, NKP, UP, CNR, GPR, etc. (SAS). (Ed's note: pic on page 16, Aug. issue, is sample of his work.)

JOHN MARTIN, R 1, Bareville, Pa., will sell B&O switch lantern.

MAX MILLER, Box 315, College Corner, O., sells size 116 pix 40 for \$2. No list.

BILL MILLSAP, 407 S. Lincoln, Robinson, Ill., trades 35mm color slides SP Ps-4 for C&E color slides, negs. 965, 2-8-2, 1930.

E. M. NEFF, 1515 Maryland Ave., Springfield, O., will trade June '22 Off. Guide, good cond. for any '34 Guide good cond.

TOM O'NEIL, 715 Verner Ave., McKeesport, Pa., buys pix, 8mm movies, info. EBT.

RUSS PORTER, 1701 S. 91 St., W. Allis, Wis., wants sharp action negs. C&NW, Soo 4-8-4's.

BILL RICE, 316 County Line Rd., Trevese, Pa., will sell back issues Railroad Magazine Aug. '56-June '59, perf. cond.

L. H. RICH, 213 Syme St., Sharon, Pa., wants steam pix PCC&SL and Allegheny Valley railroads.

WAYNE RIDDLE, 19 N. 31 St., Paxtang, Pa., buys, trades pix from calendars of steam locos NYC C&NW, GN, PRR, etc.

JIM SEACREST, 2750 Woodcrest, Lincoln, Neb., buys, trades CB&Q steam negs. size 116 and up. Answers all mail.

FRANK SEIFFERT, JR., Box 21, Orange, N. J., sells pix, steam, diesel, elec., trolleys. Either rr. or trolley list, 2 pix 25c. Both lists 3 pix 40c.

JOHN SILVA, Sidel Carril 1880, Santa Fe, Argentina, wants railfan and railroader pen pals.

R. C. SIMPSON, 4079 Camborne St., Pittsburgh, Pa., wants Dec. '41, Mar. '41, May '44 Railroad Magazine, good cond.

P. E. SKINNER, 12 Hoover Rd., Needham Hts., Mass., wants pix, negs. BE, MTA.

DWIGHT SMITH, Charlestown, N. H., sells New England, N. Y., Canadian steam, elec., diesel negs. SAS.

HAL SMITH, 61-17 68 Ave., Brooklyn, N. Y., wants PSCT, MTA trolley maps, DCT '58 map.

MARC SOLON, 704 Parkside Ave., Trenton, N. J., wants Alaska RR t.

ED SPITZER, 7722 28 Ave., Kenosha, Wisc., trades 35mm color slides midwest rrs. for southern, southwestern rrs.

WALLY STEIGERWALD, Aurora, Ind., wants CCC&SL pix depots, towers, structures, Cinn. to Sunman, 1905 emp. tt. Chicago White Water Div.

JOEL STOKES, 3958 S. Hill St., Los Angeles, Calif., buys builders pix.

JOHN STRAUSS, JR., 902 Main St. NE, Minneapolis, Minn., wants steam, diesel pix, info. CB&Q, CMS&P, D&RGW, GN, NP, WP.

PAUL STRINGHAM, Box 743, Peoria, Ill., sells tfs., emp. Hs., rule books, maps, etc., steam and elec.; 1938 Loco. Cyclopedia. (SAS) Wants alltime C&A roster.

WM. VOLKMER, 1113 22 Ave., Altoona, Pa., sells diesel color slides.

DON WALKER, RR 1, St. Joseph, Ill., wants pen pals.

C. R. WATERMAN, 931 Burton St. SE, Grand Rapids, Mich., buys, trades steam pix PM, E&LS, M&NE, DC&A, NYC, GTW.

E. A. WEBB, Box 42, Logansport, Ind., sells p.c. size pix PM, GTW, NYC, Wash. CIL, C&O, etc. List, sample 20c. Buys size 116 negs.

H. H. WILLIAMSOB, 830 Wilson Drive, New Orleans, La., sells Costa Rica 50-centavo metal rr. tokens 7 for \$1 plus postage.

GARY WILSON, 353 Penn St., Pasadena, Calif., sells 11 trolley pix for \$1.

BRUCE YOUNG, 67 S. McKinley, Battle Creek, Mich., wants trolley negs. esp. NOPS, DCT, BCT, Mich. interurbans.

WALT ZULLIG, 475 Oak Ave., Maywood, N. J., sells color prints, 35mm slides Eastern, Midwest rrs., trolleys. (SAS). State interests.

MODEL TRADING POST

MEL AURENZ, 321 E. Platte Ave., Ft. Morgan, Colo., will trade Winchester 52 rifle, Luger pistol for O gauge scale equip.

R. H. CARLSON, Box 222, Combes, Texas, will swap back issues Railroad Magazines and Trains for MRR, Mod. Craftsman.

RUSS CHRISTENSEN, 157 Manor Pkway., Rochester, N. Y., sells, trades HO gage kits. (SAS)

JIM FRY, 13718 Kelso, Cleveland, O., will sell Lionel catalogs '54, '56-'58.

BOB GARASHA, 4102 Argyle St., Chicago, Ill., will sell All Nation SLRX O gage reefer kit or trade for HO, HO3 items.

CHUCK GOODE, 109 Pine St., Gallipolis, O., will trade Lionel 2046, 2328, good cond., for Lionel 2354 NYC, good cond.

JIM GRAVES, 12031 75 S., Seattle, Wash., will sell compl. HO gage layout, 2 locos, 10 cars, power pack, 125 ft. track, 12 sws. (SAS)

WILLARD HARVEY, RFD 2, Sandy Hook, Conn., will sell HO scale model New Haven EP-2, '105.

DICK JOWERS, 3967 Arden Way N.E., Atlanta, Ga., will sell AF layout, 2 locos, sws., transformer, etc., that cost him \$125. Make offer.

E. LARSON, Rt. 3, Box 275, Cedar Lake, Ind., will trade Lionel 256 for any Lobaugh or Scalecraft loco kit.

C. W. LOGAN, Box 994, Sioux City, Iowa, sells HO gage bldgs., figures, cars. Wants Varney, Walters cars. List free.

AL MILLER, C&NW Trainman, 3212 34 Ave. S., Minneapolis, Minn., wants Lionel, Ives, Dorian, AF std. gage tr. sets, cats., accessories.

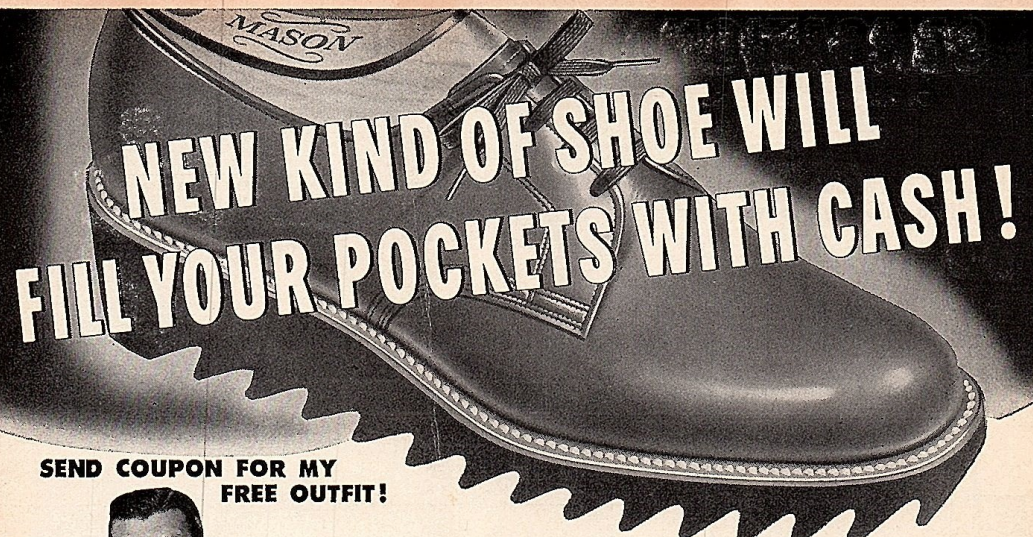
BILL PAUL, 107 Richardt, Evansville, Ind., will sell SP display frs. made in 1915 for Panama Pacific Exposition, Ives 3245, White 3243, etc.

A. SCHIFFER, 70 S. 9 St., Brooklyn, N. Y., wants Lionel 412-416 in original paint, excellent cond.

P. R. STARTZMAN, 329 Ruxton Ave., Manitou Springs, Colo., sells HO3, HO period kits, parts, locos, cars, structures. List, 10c.

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